Comment Response Tables
SSSTF 90% Draft:
EPA

#### **SSSTF 90% DESIGN PACKAGE**

## DOCUMENT REVIEW, COMMENT, RESOLUTION LIST – EPA<sup>a,b</sup>

#### **DOCUMENT TITLE: 90% SSSTF RD/RA Work Plan Comments – (General)**

DUC	CIVILLIA	111111	U/U DDDIT RD/RA WUIKTI	an Comments (General)
	SECTION/			
	FIGURE/			
ITEM	APPENDIX	PAGE	COMMENT	RESOLUTION
11EM 1	General	PAGE	This design report addresses the infrastructure support facilities for the landfill and includes an administrative building, truck scale, decontamination building, container (i.e., dumpster) storage area, and employee and landfill equipment parking. However, it appears that there is no provision for landfill equipment maintenance. Given that it appears that the landfill equipment will be kept in a	No change to the document. There are no facilities planned for vehicle maintenance beyond the possible use of the decontamination facility or the contaminated equipment pad adjacent to the decontamination building. Maintenance on contaminated equipment is expected to take place in or near the landfill, which is not an unusual method related to heavy construction equipment  Refueling activities will be accommodated on an as needed basis utilizing tanker trucks designed for that purpose. Special refueling facilities are not required given existing operating
			contaminated zone, it can be assumed that landfill equipment maintenance will be on-site. A vehicle maintenance bay and fuel storage facility should be included as part of the support facilities.	procedures in similar facilities at the INEEL.

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	SECTION/			
ITEM	FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
2	General		The design reports states that a future Phase II structure may be needed The general location of the Phase II facilities should be identified. The utilities should accommodate the potential requirements for Phase II facilities. Specifically, potable, raw and waste water systems should include stubs and be sized to accommodate a reasonably expected case. Also, the administration building should include conduit penetrations and duct bank stubs to accommodate communications with the future Phase II facility.	The conceptual Phase 2 facilities are outlined on Figure 1-3, on Page 1-4 in the RD/RA work plan. The text was clarified to indicate that all utilities being brought from INTEC would be of sufficient capacity to accommodate Phase 2 facilities as needed. The potable water, sanitary sewer and firewater facilities are more than adequate to accommodate any future growth. These utilities are also configured to accommodate any additional extensions with minor interference to the existing facilities without needing to provide stubs.  There is presently ample fiber optic cable to accommodate not only the Phase 1 facilities but also any foreseeable Phase 2 facilities.  In addition there are empty conduits in the Phase 1 design to accommodate cable for telephone in the Phase 2 design.
3	General		Aside from the contaminated equipment pad, all storm water appears as sheet flow onto the surrounding ground with no storm water collection system. The grading plan indicates all water flows toward the site perimeter and the road cross sections are for a crowned road with no drainage swales. The Storm water Plan in Appendix I indicates that "a vegetated buffer zone will be maintained outside INTEC to filter storm water." All areas where contaminated vehicles are traveling should have storm water controls and lead to a sediment basin, where accumulated sediment can be excavated and treated or disposed in the landfill, if appropriate.	No change to the document. All roads and grounds are expected to be clean during operations. All contaminated surfaces will have water collection systems and direct their effluent to the evaporation ponds. Any contamination events in clean areas will be immediately remediated.
			the landfill, if appropriate.  Suggestion: It may be appropriate to	

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	SECTION/ FIGURE/			
ITEM	APPENDIX	PAGE	COMMENT	RESOLUTION
			wash these roads during the operational phase. Rovision should be made for sufficient volume in storm water management structures to accommodate wash water. (GB	
4	General		The wastewater design is said to address solids removal by steeling in the drainage trenches and treating non-aqueous liquids by use of an oil/water separator. The "P-trap" located below the floor in the treatment area portion of the decontamination building appears to serve both as an oil-water separator and as a collection point for transported sediment. Sizing calculations for this item should be included. Demonstrate that sediment will not be transported into the system. It is anticipated that the wash water form the decontamination areas would be heavily sediment laden. The design narrative should also address radiation contamination of wash water and the absence of treatment. Please include a discussion of the impact of sediment in the system on the radiation levels in	No change to the document. The P-trap was incorporated in the design to provide a pressure gradient from the outside of the decontamination building to the inside. A negative pressure is required inside the building to prevent airflow from the building to the outside. The only water entering the P-trap will be runoff from the Contaminated Equipment Storage Pad and will contain very little sediment. The P-trap was sized more for the geometry than the design flow. It was necessary to design it large enough to accommodate maintenance procedures. The P-trap is more than adequate to accommodate the maximum flows.  The main oil/water separator is located exterior to the north side of the building. It will retain sediment and will separate oil from the drain water coming from the treatment area and the decon building. The oil/water separator will be cleaned on a regular basis to avoid sediment from going into the lift station.  Radiation levels are low for the inventory waste to be disposed of. Wash water from the decontamination building will be piped through the double walled containment system and
5	General		the wash water. (GB)  The site paving plan should include markings for contaminated and for "clean" vehicles to keep uncontaminated vehicles and contaminated vehicles clearly separated. (GB)	No change to the document. As indicated in comment 3 above, the only contaminated work areas are controlled and will be clearly posted as such.
6	General		Design information that treatment area walls and ceiling have adequate	No change to the document. EDF-ER-302, SSSTF Design Radiological Control Analysis Draft, Section 5, analyzes

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	SECTION/ FIGURE/						
ITEM	APPENDIX	PAGE	COMMENT	RESOLUTION			
			radiation shielding should be included in the 90%. (GB)	radiation shielding close to the contaminated soil receiving treatment / stabilization. Building walls and ceiling do not need radiation shielding.			
7	General		It is unclear from the text whether the decontamination building is designed to minimize the accumulation of radiation sources on the building by dust accumulation or other methods. While it appears to have been addressed by such measures as flashing along the top of the walls in the decontamination room, other sites for accumulation of sediment are noted. These include, flanges of the metal building frame (Section C, Sheet A-5), the joints between wall panels (Detail 1-Sheet A-6) and the fire protection sprinkler pipe and heating units. Minimize exposed piping and conduit in the decontamination room and treatment room.  Suggestion: Design measures and operational procedures should be such as to ensure that the building will not become contaminated to an extent that would be considered a contaminated area subject to a future removal action. (GB)	No change to the document. The decontamination building will be governed by INEEL standard housekeeping requirements. The building and appurtenances will be cleaned on a regular and routine basis. When all waste operations have been completed the building will be completely dismantled and contaminated material will be disposed of in the ICDF landfill.			
8	General		Design calculations for the paving and subbase using anticipated loadings, should be provided. (GB)	No change to the document. Engineering Design File 1913 - "Access Road and Site Pavement Ballast Requirements" is attached to the document as Appendix B-11.			

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	SECTION/ FIGURE/			
ITEM	APPENDIX	PAGE	COMMENT	RESOLUTION
9**	General		This SAP indicates that waste will be characterized before shipment to the SSSTF. How does the SAP and/or QAPP for the sampling and characterization of waste before shipment to the SSSTF interface?  Suggestion: These documents should be provided as part of the 90% for review, or the quality criteria for characterization before shipment should be included in this SAP for completeness. (AP)	No change to the document. The waste profile sheet will determine if the waste needs treatment based on the characterization at the generating WAG. It will be received and sent to the treatment unit. This SAP only covers waste that has gone through the process. The sampling of the waste at the WAG will be addressed in the individual WAG RD/RA work plans.

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DOCUMENT TITLE: Remedial Design/Remedial Action Work Plan for SSSTF (DOE/ID-10889)

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	SECTION/			
	FIGURE/			
ITEM	APPENDIX	PAGE	COMMENT	RESOLUTION
10	Sec 2.1.2.2	2-8	The specified scale is a mechanical pit	Comment Incorporated. The mechanical scale and pit were
			type scale. Given the temporary	deleted from the design and replaced with an on grade
			nature of the need for the scale (and	electronic scale with load cells. See Dwg. S-20 and
			that the building it connects to is slated	Specification Sect. 13200.
			to be removed) a low rise platform	
			type scale should be considered. This	
			type of scale includes the advantage of	
			no additional storm sewer piping and	
			can be disassembled and either	
			relocated, of if a steel deck is	
			specified, recovered for salvage value.	
			(GB)	
11**	Sec 2.1.4.2	2-12	The text states "Treated waste is also	No change to the document. There is no laboratory facility
			required to contain no free liquids as	planned for the SSSTF. SW-846 method 9095A will either be
			determined by visual examination and	required prior to entrance into the facility, or can be performed
			the paint filter test (as defined in the	onsite without a "lab". If it is deemed necessary, a temporary
			Paint Filter Liquids Test SW-846	trailer may be brought in.
			Method 9095)." It does not appears as	
			though there is a laboratory set up or	
			work area to perform this, or any other	
			type of testing. The decontamination	
			building should provide such an area.	
10	G 3.6	2.10	(GB)	
12	Sec 2.6	2-19	There is a reference to the IDCF	No change to the document. Leachate collection system
			leachate collection system. It is	discharges directly into EP and is in no way connected to the
			unclear whether this system will tie	sewer.
			into the overall INEEL wastewater	
			system. If it does, it may be	
			appropriate to use a common sewer	
			line. The utilities plans should address	
			this. (GB)	

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	SECTION/			
ITEM	FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
13**	Sec 3.3.1	3-5	The text states there is a portion of the treatment area set aside for storage of PCB-contaminated waste that includes a 6-inch curb. This area should be clearly shown on the Decontamination Building Floor Plan, Sheet A-1, and an appropriate construction detail should be provided. (GB)	The text and Figure 1-3 have been revised to change the PCB storage area in the decontamination building to a TSCA compliant storage unit to be located outside, near the contaminated equipment storage pad. The appropriate specifications for this unit have also been included in Section 3.3.3 of the RD/RA WP. A description and drawing of this unit is also provided in the O&M Plan.
25	General		For simplicity, we recommend that appendices within an Appendix should be renamed as attachments. These attachments should be numbered in the order in which they appear in the document. For example, Appendix A of Appendix A should be renamed as Attachment 1, etc. (JF)	No change to the document. For BBWI documents, an "attachment" is not an integral part of the document, i.e., it may be revised without requiring a change in the main document. If an author wishes to have an appendix to an appendix and wishes both to be integral to the document, then renaming the second appendix to an "attachment" would be inappropriate.
26	General		Several appendices within the document include engineering design file summaries rather than substantial text. Text and supporting information should be included in any follow-up submissions. (JF)	No change to the document. A narrative summary is given for each EDF at the beginning of the EDF. Sufficient supporting information has been provided with the EDFs. The design basis is also discussed in the RD/RA WP text.
27**	General		Appendix K, Appendix M, and Appendix Q were not included in this submission. (JF)	No change to the document. These documents were submitted with the transmittal to the Agencies and are identified as Appendix K Staging, Storage, Sizing, and Treatment Facility Operations and Maintenance Plan (DOE/ID-10859); Appendix M ICDF Complex Operations Waste Management Plan (DOE/ID-10886); Appendix Q Treatability Study Test Plan for Soil Stabilization at the Staging, Storage, Sizing, and Treatment Facility Using Portland Cement-Based Reagents (DOE/ID-10903).
50	Sec 2.1.4.3.3	2-14	This section states that an air scavenger system will be installed in the SSSTF to control fugitive dust emissions. It also states that use of a baghouse upstream of the exhaust	No change to the document. The soil stabilization treatment system is a premanufactured system. Following approval of the RD/RA WP this system will be procured and installed per the procurement specification included in Appendix B of Appendix B-1, Process and Treatment Overview. Calculations

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	SECTION/			
	FIGURE/			
ITEM	APPENDIX	PAGE	COMMENT	RESOLUTION
			filter may be evaluated. This	and evaluations will be performed by the vendor and submitted
			evaluation, including calculations of	as a vendor data prior to installation.
			the air emissions, should be included	
			with this section. (JF)	

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DOCUMENT TITLE: Appendix A—Technical and Functional Requirements, WAG 3 Staging, Storage,

Sizing, and Treatment Facility (T&FR-17)

SECTION/			
PIOIDE/			
FIGURE/			
APPENDIX	PAGE	COMMENT	RESOLUTION
Sec 2.1.4	16	It states that if it is deemed necessary, the equipment and containers will be washed with a high-pressure water sprayer and checked for external radiological contamination for purposes of preventing potential release from the ICDF Complex in accordance with the RadCon Manual. However, the referenced RadCon Manual appears to deal only with personnel monitoring, not monitoring of the equipment/trucks. It is recommended that all departing equipment, in addition to personnel, should be monitored as to not spread radiological contamination. (JF)	Radiation contamination release criteria and limits for equipment / trucks are addressed in the INEEL Radiological Control Manual, PRD-183, Rev. 6, July 6, 2000, Part 2, page 4-7 titled, "Release and Transportation of Radioactive Material," Sections 421 and 422.
Table 3.1.4-1	25	Lines 1, 2 and 3 of this table refer to IDAPA 16.01.01. The correct reference should be IDAPA 58.01.01.	The citation will be changed to read 58.01.01 as of October 1999.
		Sec 2.1.4 16	Sec 2.1.4  It states that if it is deemed necessary, the equipment and containers will be washed with a high-pressure water sprayer and checked for external radiological contamination for purposes of preventing potential release from the ICDF Complex in accordance with the RadCon Manual. However, the referenced RadCon Manual appears to deal only with personnel monitoring, not monitoring of the equipment/trucks. It is recommended that all departing equipment, in addition to personnel, should be monitored as to not spread radiological contamination. (JF)  Table 3.1.4-1  25  Lines 1, 2 and 3 of this table refer to IDAPA 16.01.01. The correct

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# **DOCUMENT TITLE:** Appendix B-1. Process and Treatment Overview for the Minimum Treatment Process (EDF-ER-296)

	SECTION/ FIGURE/					
ITEM	APPENDIX	PAGE	COMMENT	RESOLUTION		
53	Sec 3.2		This section states that CPP-98 and CPP-99 have not been sampled and the nuclide activities are design inventory estimates primarily based on scaling factors. An explanation should be included concerning sampling limitations and method on which the author is basing thier estimate (i.e., provide calculations). (JF)	No change to the document. As referenced in the tables providing the estimated concentrations, these values and a description of how they were estimated are provided in EDF-ER-264 submitted to the Agencies in April 2001 and in the CERCLA Waste Inventory Database for the OU 3-13 Waste Disposal Complex (CWID) submitted in December 2000.		
54			Please note that if the MBS technology will be used at the SSSTF, certain sections within this Appendix will have to be changed accordingly. For example, since the MBS technology cannot be used with wastewater with less than 40% solids, Section 5.1.3 (Aqueous Liquid/Sludge Wastes) should be revised to include this limitation. (JF)	No change to the document. Section 5.1.3 of the referenced Appendix is part of the procurement specification for the treatment system. This section was written to ensure the system would have the capability to treat sludge and waste water. This is not a procedure to treat this material. Section 5.1 of the Process and Treatment Overview states that the concept for treating liquid and sludge is to inject the liquid/sludge directly into the mixer with a compatible soil and then add the stabilizing chemical to treat both the liquid/sludge and the soil.		

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· Utilities-Raw Water and Potable Water (EDF-2655) DOCUMENT TITLE: Annendix B-4, SSSTF Phase 1

2				г						
DOCUMENT ITTEE: Appendix D-4: 333 II Thase I - Chilles-Naw Waler allu I Olablie Waler (EL			RESOLUTION	Comment Incorporated. INTEC has two deep potable water	wells, which are located onsite. They are WEL-UTI-504 and	505. Each well is operated on a monthly rotation basis.				
ppenuiv D-4. SOUTH I mase			COMMENT	This section describes how the SSSTF	potable water line will be tied into the	existing INTEC lines. However, the	source of this potable water is not	identified. Please discuss whether this	water comes from an on-site well,	municipal tie-in, etc. (JF)
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CIVILLIA	SECTION/	FIGURE/	ITEM APPENDIX	Sec 3						
			ITEM	55						

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**DOCUMENT TITLE: B-5. INTEC Fire Water System for the ICDF Complex (EDF-1948)** 

	SECTION/			
100001	FIGURE/	2.00		
ITEM	APPENDIX	PAGE	COMMENT	RESOLUTION
56			Pages within this section should be renumbered. (JF)	Comment Incorporated. Page numbering was corrected.
57	Additional		This section states that an analysis to	The NFPA code requires there be enough water available to
	Info		determine the expected water pressure	fight a two-hour fire event. The INTEC fire water supply
ŀ		1	available for a two-hour fire duration	system far exceeds this requirement. The additional
			and the effects of the lowered water	information that was included in the hydraulic calculations give
			levels throughout the fire duration for	the flow and pressure that is expected throughout the two-hour
			both the proposed SSSTF and the	fire event. These pressures and flows are given in 1/4-hour
			ICDF will be summarized in the tables	increments and are attached in EDF-1948 in the tables labeled
			on the attached reports. However,	"Calculated Results Summary". These tables are found on each
			these reports are not attached. Please	of the sheets of Report-1 through Report-4 for each test point
			include. (JF)	calculated. The test points are shown on the attached drawing in
				the EDF. In all cases the working pressures are more than
				adequate to meet the NFPA requirements

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**DOCUMENT TITLE:** Appendix B-8. SSSTF Design Radiological Control Analysis (EDF-ER-302)

	SECTION/			
	FIGURE/			
ITEM	APPENDIX	PAGE	COMMENT	RESOLUTION
28	Sec 2, 3 <sup>rd</sup> para	2-2	It states that waste stream CPP-92 for each radionuclide has the highest specific activity. Table 3-1 indicates that CPP-36/91 has the highest individual specific activity for Cs-137 and Pu-238. These are generally the limiting isotopes for external and internal exposure respectively (for the waste streams indicated). This difference should be resolved or explained. (JM)	Waste streams CPP-92, 98, and 99 are the only ones currently being considered for treatment / stabilization. Other waste streams will need to be analyzed on a case-by-case basis. No change to documents.
29	Sec 4, 1 <sup>st</sup> para	4-1	It states that CPP-92 is used as the worst case scenario. Table 4-1 uses specific activities for CPP-36/91 as the worst case value. These differences should be resolved or explained. (JM)	See response to comment #28
30	Sec 6	6-1	The specific activities used in the internal dose calculations are the limiting values for the waste streams CPP-92, 98, and 99 (CPP-92 is the most limiting). Are these the only waste streams that will be stabilized? CPP-36/91 has a Pu-238 specific activity approximately 30 times the CPP-92 value. Will CPP-36/91 ever be considered for stabilization? Will radiological control procedures impose a limit on the alpha specific activity of soil/materials destined for stabilization? (JM)	See response to comment #28

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**DOCUMENT TITLE: Appendix C-1 Procurement Specifications for Trailer. (SPC-1484)** 

DUC	CIVILLIA		ippendix e i libediement	specifications for Transcri (ST & T to 1)
	SECTION/ FIGURE/			
ITEM	APPENDIX	PAGE	COMMENT	RESOLUTION
14			The administrative trailer appears to have a standard type HVAC System. Given the potential dust in the area and the potential exposure hazard for office workers, provide intake air filters of suitable design for the anticipated risk. (GB)	The administrative trailer is equipped with a standard HVAC system. Potential dust exposures will be controlled in the landfill and treatment area at the source of dust generating operations utilizing engineering controls including misted water, HEPA filtration ventilation, enclosed treatment operations, and administrative controls including operating procedures which outline environmental operational parameters.
				Contaminants are controlled at the source to prevent personnel exposure to workers during off-loading and moving of soils into the disposal cell where no respiratory protection is anticipated. Therefore, no special IIVAC system is necessary in the SSSTF administrative buildings located some distance from the soil disposal placement operations.

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**DOCUMENT TITLE: Appendix D—Design Drawings** 

DOC	SECTION/	11111, 1	Appendix D—Design Drawin	
	FIGURE/			
ITEM	APPENDIX	PAGE	COMMENT	RESOLUTION
15	Sheet U-9, Detail 19		The constructability of this liner system detail at a 90 degree bend should be reviewed. The specifications should include seaming and overlap criteria to ensure that the drainage system will function properly. (GB)	The specification will be clarified to assure proper procedure for seaming and overlap is provided where the liner is required to make 90-degree bends.
16	Sheet C-1		The empty container holding pad appears on the legend to be made of "new asphalt concrete" (flexible paving), but the reinforcing information is more typical of a rigid cement concrete item. This apparent discrepancy needs to be corrected. Further, cement concrete may be preferable due to the impact lading and surface scraping that occurs with loading and unloading of roll-off type containers. The concrete should be epoxy sealed and drainage form this area should be contained and treated with the site wastewater. (GB)	The holding pad is constructed of reinforced concrete. The legend and the plans will be changed to make this more clear. See the discussion on Storm Water Drainage on Comment #3
17	Sheet A-7		Provide epoxy coating of hall floor, base and CMU walls at a minimum in the portion of the hall along the RADCON room and PPE Change Room. (GB)	The plans will be modified as required to provide epoxy coating in the locations noted so that the surfaces can be cleaned on a routine basis.
18	Sheet S-2; 7		The foundation plan states in a note "provide secondary containment system under the floor see plans and specs." Provide similar secondary containment for the contaminated equipment pad. (GB)	Curbing provides secondary containment for the outside storage pad. The container provides primary containment. The secondary containment under the floor of the building is for the sump and piping. 40 CFR 264.193 & 40 CFR .175.

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**DOCUMENT TITLE:** Appendix J—ICDF Complex Waste Acceptance Criteria (DOE/ID-10881)

	CIVILLIA		Appendix of Tebr Complex	waste Acceptance Criteria (DOE/ID-10001)
	SECTION/ FIGURE/			
ITEM	APPENDIX	PAGE	COMMENT	RESOLUTION
24	Sec 2.5.2	2-7	Process knowledge is being used to determine many aspects of waste. The author(s) should provide examples and/or evidence that process knowledge is an accurate means with a known level of confidence to characterize waste streams. Additionally, the author(s) should include periodic confirmation of waste characterization capabilities by process knowledge alone through actual sampling of waste streams. (AP)	Discussion topic during week of November 12
43	Figure 1-3	1-7	This management and operations organization chart shows the QA/QC officer reporting to the ICDF Complex Operations Manager. The QA/QC function should be independent of the ICDF Complex Operations Manager. Please clarify. (AP)	The org chart will be revised. The QA/QC officer's title will be changed to Data Specialist and a QA/QC officer position will be added.
44	Figure 1-5.2, bullet 6	1-8	It states that one of the ICDF Personnel Responsibilities include "Maintaining a proactive quality assurance oversight program for timely identification of deficiencies and implementation of appropriate corrective actions." The quality assurance oversight program and corrective actions should be included in the Quality Project Plan? (AP)	This section of the WAC is intended to outline general duties of the ICDF personnel. The Quality Assurance program for the facility is presented in the QAPjP, Rev. 6. The QPP is the construction quality plan and does not apply after the facility is built.

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	SECTION/ FIGURE/			
ITEM	APPENDIX	PAGE	COMMENT	RESOLUTION
45	Sec 2.2.1	2-3	This section indicates that there can be exceptions to the WAC Requirements and provides one example of an exception. This section should include all known and expected exceptions to the WAC requirements and any potential affect these exceptions will have on compliance with regulatory agencies requirements. (AP)	If the exceptions were known they would be addressed in the WAC and would not be exceptions.
46	Sec 2.4.2, 3 <sup>rd</sup> para	2-5	Please explain how process knowledge applies to historical soil contamination sites without supporting analytical data.	Discussion topic during week of November 12.
47	Sec 2.5.5, last bullet	2-8	It states that the method used to determine the concentration of a radionuclide should be documented with a detailed description of the method. The analytical method should already be decided upon and made available in the SAP or QPP for this project. (AP)	The method referred to in the text is not a laboratory analysis; rather it is the approach used to estimate concentrations of other radionuclides. This method is similar to a process knowledge discussion.
48**	App A, Sec A.4, Item 3	A-10	This section states "Since LDR's are not applicable to the unit [CAMU], there is no reason to sample to demonstrate that LDRs are being met." Whether LDR's are applicable to the evaporation pond does not eliminate the need to sample for purpose of short-term risks, compatability, and compliance with WAC.	The sampling of the pond and those methodologies will be discussed in the 90% O&M plan for the ICDF.
49	Figure 1-3	1-7	How will the potential for vapors from VOCs in leachate or liquid wastes discharged into the evaporation ponds be controlled to be protective of the community, worker & environment?	Worker and public risk are being dealt with in the risk assessment documents for the ICDF.

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DOCUMENT TITLE: Appendix N—Quality Program Plan for the INEEL CERCLA Disposal Facility

Complex (PLN-873)

Com	hiex (L Tild-	013)		
	SECTION/ FIGURE/			
ITEM	APPENDIX	PAGE	COMMENT	RESOLUTION
20			The QPP is taken up with organizational responsibilities for project personnel and is so abbreviated that it fails to discuss how the projects quality will be ensured.  Suggestion: Review EPA QA/R-5 for guidance in order to provide a Quality Assurance Project Plan that documents how quality assurance and quality control will be applied to the environmental data collection and to assure that the results obtained are of the type and quality needed for a specific	EPA QA/R-5 is used for guidance in order to provide a Quality Assurance Project Plan (QAPjP) that documents how quality assurance and quality control will be applied to the environmental data collection and to assure that the results obtained are of the type and quality needed for a specific decision or use. DOE/ID-10587 is the QAPjP for WAGs 1, 2, 3, 4, 5, 6, 7, 10 & Inactive Sites. It has been submitted and approved by DOE. No change to the QPP is needed.
21			decision or use. (AP)  The author(s) of this QPP indicate that it will be used for the purpose of constructing and initial operational testing of the ICDF and will be re-evaluated at a later date to determine if another QPP is needed for continued operations. Please indicate when information will be available to develop a detailed QPP for continued operations. (AP)	BBWI requirements do not mandate a QPP for all activities. If the SSSTF and ICDF determine that operations can be accomplished by following the BBWI quality manual with no exceptions, a QPP for operations is not required. That determination will be made when the readiness evaluation is completed for the combined facility. No change to the QPP is needed.

a. \*\* Indicates items of particular concern.

b. These comments are grouped by document (original EPA comments were not), so item numbers may not be consecutive within each document. <u>All EPA comments of 10/08/01</u> are reflected here.

	SECTION/ FIGURE/			
ITEM	APPENDIX	PAGE	COMMENT	RESOLUTION
22	ATLIBIA	TAGE	Much of the criteria which should be included in the SAP is not provided in the text. For example, sections such as, frequency of quality control sample collection, waste management, special training/certifications, and both DOE-ID and laboratory Standard Operating Procedures (SOP's), are not provided in this SAP, but are only cited as a reference to another document.  Suggestion: With only references and little detail included in this SAP, it is incomplete and should be completed	Please refer to Agency-approved Rev. 6 of DOE/ID-10587, Quality Assurance Project Plan for Waste Area Groups 1, 2, 3, 4, 5, 6, 7, 10 and Inactive Sites.
23			before a final review. (AP)  Analytical method numbers (i.e.,1311/3000/7000) are provided in the SAP, however, there is no indication that these numbers refer to approved EPA methods. What approved EPA methods be used for this project? (AP)	Please refer to Agency-approved Rev. 6 of DOE/ID-10587, Quality Assurance Project Plan for Waste Area Groups 1, 2, 3, 4, 5, 6, 7, 10 and Inactive Sites
41	Sec 1.0	5	The QPP should be a stand alone document rather than referencing other documents (AP)	The QPP is a standalone document but is not an EPA QA/R-5 document. No change to the QPP is needed.
42	Sec 1.0	7	This section states that "A Quality List for this project is not required since all equipment and the design have been categorized as low-safety consequence." This statement requires further clarification. (AP)	The QPP is an internal BBWI document that addresses compliance with ASME NQA-1 and the definition of low-safety consequence is based on the hazard category. BBWI procedure MCP-540 provides the definitions, though confusing, for low-safety consequence. No change to the QPP is needed.

<sup>a. \*\* Indicates items of particular concern.
b. These comments are grouped by document (original EPA comments were not), so item numbers may not be consecutive within each document. <u>All</u> EPA comments of 10/08/01 are reflected here.</sup> 

# DOCUMENT TITLE: Appendix R—Sampling and Analysis Plan for the SSSTF Waste Stabilization Operations, WAG 3, OU 3-13 (DOE/ID-10924)

			5 5-15 (DOE/ID-10/24)	
	SECTION/			
	FIGURE/			
ITEM	APPENDIX	PAGE	COMMENT	RESOLUTION
19	General		This SAP indicates that waste will be	No change.
			characterized before shipment to the	
			SSSTF. How does the SAP and/or	
			QAPP for the sampling and	
			characterization of waste before	
			shipment to the SSSTF interface?	
			Suggestion: These documents should	
			be provided as part of the 90% for	
			review, or the quality criteria for	
			characterization before shipment	
			should be included in this SAP for	
			completeness. (AP)	
31	Figure 2-1	2-7	This figure does not indicate the	Basis is clearly stated in 4 <sup>th</sup> paragraph of Section 2.7.2 and also
			volume of soil that one grab sample,	refers back to Section 2.5, Decision Rule.
			composite sample, or treatment batch	
			will represent nor the basis for the	A sentence was added between sentence 1 and 2 of Section 2.4,
			number of samples that will be	Study Boundaries, which says: "A typical batch is
			collected. Please provide the basis for	approximately 2 yards, which is equal to the amount of soil in a
			the number of samples that will be	2'x4'x8' box." This Section was a more appropriate Section to
			collected. (AP)	place this text than the earlier proposed resolution Section.
32	Figure 2-1	2-7	What assumptions about the waste	Basis is clearly stated in 4 <sup>th</sup> paragraph of Section 2.7.2 and also
			treatability study and stabilization	refers back to Section 2.5, Decision Rule.
	1		operations have been made to support	, ,
			the change in frequency of sampling of	A sentence was added to the end of the 4 <sup>th</sup> paragraph of 2.7.2,
			the treatment batches from 100%, to	Stabilized Waste Sampling that says: "The frequency of waste
			40%, and then to 20%. Please explain	sampling may be changed by the project manager if deemed
			this rational. Also, is there a	necessary due to unexpected changes in waste characterization."
			contingency plan for project managers	
			to change the sampling frequency if	
1			unexpected changes in the waste	
			characterization indicate that it is	
			necessary? (AP)	
	1	1	1	1

a. \*\* Indicates items of particular concern.

b. These comments are grouped by document (original EPA comments were not), so item numbers may not be consecutive within each document. <u>All</u> EPA comments of 10/08/01 are reflected here.

ITEM	SECTION/ FIGURE/ APPENDIX	DACE	CONDUCTO	DESCULLTION.
33	Sec 4.3.1	PAGE 4-3	COMMENT  This section only states that samples will be preserved as indicated in the laboratory Scope of Work. However, the reader does not have the specifics regarding the manner in which samples will be preserved. Without the laboratory SOW, the SAP incomplete. Please provide this information in the SAP. (AP)	"and Quality Assurance Project Plan for Waste Area Group 1, 2, 3, 4, 5, 6, 7, 10, and Inactive Sites (DOE-ID 2000)." Was added to the end of the sentence.
34	Sec 4.4	4-3	This section states that "Determination of the need for RML screening will be made by the RCT in the field." If the soil will be RML screened, then the SAP should clearly state that soil will be field screened. The SAP should also include the criteria that the RML will use (i.e., concentrations of radionuclides detected by field measurements) in order to determine if samples will be sent to the RML.	First paragraph was rewritten as follows: "Following sample collection, all sample containers will be smeared for external contamination. In addition, a handheld radiation reading will be obtained to determine radiation levels at the surface of the sample containers. If radiation readings exceeding background are detected, an additional sample will be submitted to the Radiation Measurements Laboratory (RML) at TRA-620 or to the Analytical Laboratory Department at INTEC-602 for a 20-minute gamma analysis prior to shipment off-site."
35	Sec 4.4	4-3	The percentage of samples that will be field screened for radiation levels is not stated, nor is the percentage that will be validated by analyzing a certain percentage of them analytically? (AP)	Comment was covered by response in #34 above.
36	Sec 5.1.1, last sentence	5-1	It states "Precision goals have been established for inorganic Contract Laboratory Program (CLP) methods by the EPA (EPA 1993)." These precision goals should be included in this SAP. (AP)	"and Quality Assurance Project Plan for Waste Area Group 1, 2, 3, 4, 5, 6, 7, 10, and Inactive Sites (DOE-ID 2000)." Was added to the end of the sentence.
37	Sec 5.1.5	5-2	It states that "The completeness goal for this project is 100% for critical activities and 90% for noncritical activities." What are considered critical and noncritical activities is not	Sentence was reworded to say, "The completeness goal for this project is 100% for all activities."

<sup>a. \*\* Indicates items of particular concern.
b. These comments are grouped by document (original EPA comments were not), so item numbers may not be consecutive within each document. <u>All</u> EPA comments of 10/08/01 are reflected here.</sup> 

	SECTION/ FIGURE/			
ITEM	APPENDIX	PAGE	COMMENT	RESOLUTION
			given. (AP)	
38	Sec 5.3	5-2	This section states that no data validation will be performed on the analytical results generated as a result of this sampling program. However, other sections of this SAP refer to the use of data validation to achieve quality control, such as Section 5.1.5 Completeness. It is contradictory to state that no data validation will be performed on analytical data, when project quality objectives rely on validation to meet project goals. (AP)	Sentence was reworded to say, "Data will be validated to analytical method data validation A or B as described in the Quality Assurance Project Plan for Waste Area Groups 1, 2, 3, 4, 5, 6, 7, 10 and Inactive Sites."
39	Figure 7-1	7-2	It appears that the QA/QC officer apparently reports to the ICDF Complex Operations Manager. According to EPA QA/R-5, the project quality assurance manager must be independent of the unit generating the data (AP)  Suggestion: The project flow chart should indicate who will be an independent quality assurance manager	The org chart will be revised. The QA/QC officer's title will be changed to Data Specialist and a QA/QC officer position will be added.

<sup>a. \*\* Indicates items of particular concern.
b. These comments are grouped by document (original EPA comments were not), so item numbers may not be consecutive within each document. <u>All</u> EPA</sup> comments of 10/08/01 are reflected here.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
40	Sec 2.1	2-1	This section states, "based upon process knowledge, the hazardous constituents that are considered potentially present are limited to metals covered under the UTS." What about the potential that other hazardous constituents, such as VOC's, pesticides, and radioactive materials are present?  Suggestion: The document should explain the confidence level of existing process knowledge, include approximate concentrations of contaminants, and indicate if existing process knowledge will be confirmed by continued sampling for additional constituents. (AP)	Sentence was added to the end of the existing paragraph as follows: "However, based upon data supplied by the waste profiles additional contaminants may be identified in the future. If additional contaminants are identified, analysis for those contaminants will be performed."

<sup>a. \*\* Indicates items of particular concern.
b. These comments are grouped by document (original EPA comments were not), so item numbers may not be consecutive within each document. <u>All</u> EPA comments of 10/08/01 are reflected here.</sup> 

Comment Response Tables

SSSTF 90% Draft:
IDEQ

### **SSSTF 90% DESIGN PACKAGE**

## **DOCUMENT REVIEW, COMMENT, RESOLUTION LIST - IDEQ**

DOCUMENT TITLE: Draft RD/RA Work Plan for the SSSTF, General Comments

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
1	General	General	<ul> <li>a) Several of the Appendices were not arranged sequentially and had the following statement on the cover page, "The document that is the subject of this appendix was provided as an attachment to the original submittal." Note that each portion of the August 24 submittal (including all appendices) is considered part of the RD/RA Work Plan primary document, and is subject to all processes outlined in the FFA/CO regarding primary documents.</li> <li>b) It appears that the SSSTF documentation does not address fugitive emissions associated with the ICDF transportation and waste handling activities. A NESHAPS evaluation of the entire ICDF complex may be more appropriate than attempting to develop separate emission factors for each station on the ICDF process flow diagram.</li> <li>c) Many of the concerns presented herein pertain</li> </ul>	documents, an "attachment" is not an integral part of the document, i.e., it may be revised without requiring a change in the main document. If an author wishes to have an appendix to an appendix and wishes both to be integral to the document, the renaming the second appendix to an "attachment" would be inappropriate.  b) No change to the document. Emissions associated with the ent ICDF, including the SSSTF, were modeled in the NESHAPs evaluation performed in EDF-ER-290. As part of this evaluation, the entire ICDF complex was modeled, including transportation within the facility. Activities performed beyond the gates of the ICDF complex, such as remediation and transportation, were not included in the evaluation as they are assessed as part of the remediation activity.  c) Comment noted. No change to the document.  d) Some of the AWWA specs referenced do not apply to this project. (AWWA C600 and AWWA C905 are ductile iron pine
			to text that is repeated in multiple sections of this submittal. Please note that we have not repeated our comments for each reference of an item of concern throughout the RD/RA Work Plan package. However, our comments apply to all similar references of the issue throughout the document.	standards and HDPE pipe is being used). The project specifications have been modified to include all the additional

ITEM SECTION FIGURE/ APPEND	COMMENT	RESOLUTION
	d) This document contains various design elements for the facility wastewater systems, sewage works, and potable water systems. It is apparent from this review that portions of the design are not in accordance with various standards, such as AWWA (C600, C651, C800, C900, 905), the 1997 Recommended Standards for Water Works, the Idaho Rules for Public Drinking Water Standards, the ANSI/NSF Standard 61, and the 1997 Recommended Standards for Wastewater Facilities. Please clarify why these standards are not referenced and adhered to. Specific comments pertaining to these issues are provided below for Appendices B-3, B-4, B-6, C, and D.	

DOCUMENT TITLE: Draft RD/RA Work Plan for the SSSTF, DOE/ID-10889

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
2	Sec 2.1, last para under section heading	2-2	The text states that requirements for the SSA are not included. The text should therefore state that these requirements, outlined in the SSA Waste Management Plan will remain in effect.	The first sentence was clarified to state: "Although included as part of the SSSTF, the design requirements for the SSA are not included in the design criteria for the SSSTF since the SSA has already been constructed."  Once the RD/RA work plan has been approved, the SSA will operate under the SSSTF requirements. The SSA WMP will not remain in effect and associated procedures and technical guidance
3	Sec 2.1.1.1,	2-2	The RD/RA Work Plan should provide a traffic	will be assimilated into SSSTF documentation prior to prefinal inspection.  No change to the document. All roads and grounds are expected
	para 1		pattern for vehicles around the site and landfill. Clarification is needed to show how vehicles that are potentially contaminated will access the decontamination building and clarify how trucks leaving the landfill will travel for decontamination prior to scaling out. If this information has been included in another portion of this submittal, please reference the location.	to be clean during operations. Any contamination events in clean areas will be immediately remediated. Any contaminated work areas will be controlled and clearly posted as such. The Operations and Maintenance Plan describes decontamination procedures and traffic movement within the SSSTF/ICDF Complex.
4	Sec 2.1.1.3, 2 <sup>nd</sup> bullet Sec 2.1.3.12,	2-3	Both sections contain the following statement:  "The SSSTF shall include design provisions to	The text was clarified in the 2 bullets to recognize the ARARs that provide a design basis associated with radiological emissions. The wording for the bullets is as follows:
	3 <sup>rd</sup> bullet	2-11	limit emissions of radionuclides to the ambient air to levels below that which would cause any member of the public to receive in any year an effective dose equivalent of 15 mrem/year."	"The SSSTF shall include design provisions to limit emissions of radionuclides to not exceed levels established in DOE O 435.1 and to comply with NESHAP emission limits."
			Please note that the remedy must comply with the NESHAP limit for all radionuclide emission sources on the INEEL, which is 10 mrem/year to the general public. If the impact of the uncontrolled SSSTF emissions (see 40 CFR 61.93(b)(4)(ii)) exceeds 0.1 mrem/year to the maximally exposed individual, radionuclide emission measurement is required in accordance with 40 CFR 61.93. (b). Exceedance of	

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
			the 0.1 mrem/year standard would also trigger the State of Idaho Potential for Significant Deterioration (PSD) standards. While this would not immediately impact the SSTF, it would necessitate all new or modified radionuclide emission sources on the INEEL be equipped with the best available control technology (BACT).	
5	Sec 2.1.1.4, para 1, 2 <sup>nd</sup> sentence	2-3	Please confirm that signs shall be placed in accordance with 40 CFR 264.14 (c), which specifies that signage shall be placed at the entrances and at other locations in sufficient number to be seen from any approach to this active portion. Note that the regulation specifies a standard legible reading distance is 25 feet apart. If this information has been included in another portion of this submittal, please reference the location.	The text was clarified to state that correct CERCLA signage will be installed to comply with the regulatory requirements.
6	Sec 2.1.1.10, para 3	2-5	Inconsistent design assumptions are used in RD/RA Work Plan regarding the fire system delivery system. The fire system delivery capacity was designed for a period of 2 hours and an available flow of 3000 GPM from the INEEL complex system. This could amount to 360,000 gallons. The deliver rate is designed at .25 gpm/sq. ft. over 5000 sq. ft. area with a 500-gpm rate for a fire hose. (EDD-1948 page 4 of 5). In Appendix B-6 EDF 2648 on the design profile, page 1 of 2, design is for .15 gpm/sq. ft. and an area of 3500 sq. ft. In addition, the period of fire fighting is only ½ hour. Please discuss the rationale of this design basis, and what allowances were given to the containment pad holding additional water. In addition, please identify what allowances were included for the pad containing precipitation.	The first phase of this task was to make sure adequate fire water was available and to size the pipe serving the SSSTF. The 360,000 gpd is based on a flow of 0.25 gal/sf over an area of 5000 sf, a 500-gpm hose stream and a 1250 gpm additional flow was added for a simultaneous wildland brush fire.  The second phase was to address the amount of runoff drainage that is required in the event of a fire in the decon building. Initially, criteria from Factory Mutual were used to calculate the required storage. However, NFPA-801 Standard for Fire Protection for Facilities Handling Radioactive Materials is the required code. Based on this code, the required storage volume is 21,300 gallon. EDF-2648 has been clarified to reflect this.
7	Sec 2.1.1.13, para 3	2-6	According to the paragraph text, it is unclear whether all occupants within the SSSTF possess a radio (tuned to the Warning Communication Center (WCC) or a designated person will possess a radio. Please clarify who will have radios to know that an	No change to the document. Specific discussions identifying typical warning communications systems implemented at SSSTF facilities are provided in the Operations and Maintenance Plan in Appendix K.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
			emergency situation is occurring outside of the SSSTF.	
8	Sec 2.1.3.1, para 1, last sentence	2-8	The text states that the Decontamination Bldg. has area set aside for TSCA waste. This storage area would require 6" curbing. Please identify what area of building is planned for PCB storage, and where it is detailed in the design drawings.	The text and Figure 1-3 have been revised to change the PCB storage area in the decontamination building to a TSCA compliant storage unit to be located outside, near the contaminated equipment storage pad. The appropriate specifications for this unit have also been included in Section 3.3.3 of the RD/RA WP. A description and drawing of this unit is also provided in the O&M Plan.
9	Sec 2.1.3.7, para 2	2-9	The trenches in the containment building are designed per 40 CFR 264 subpart J. The work plan should discuss how the leak detection requirements will be met. If this information has been included in another portion of this submittal, please reference the location.	The text was revised to indicate that the SSSTF Decontamination building is regulated under 40 CFR 264.1100, containment buildings. 40 CFR 264.1101 (b)(3)(I) lists conditions that satisfy the leak detection through design requirements. The decontamination building meets these requirements.
10	Sec 2.1.3.12, 4 <sup>th</sup> bullet	2-11	The SSSTF will be designed with provisions to control dusts, but in addition to dusts, a significant amount of aerosols will be generated during decontamination utilizing high-pressure sprays, etc. Please address and reference this aspect of design and physical control(s). If this information has been included in another portion of this submittal, please reference the location.	No change to the document. High-pressure sprays and mist used for decontamination will not cause contamination in excess of the dust that cannot be dealt with by decontaminating the walls and floor of the decontamination bay.
11	Sec 2.1.4.2, 3 <sup>rd</sup> bullet	2-12	The bullet identifies that the air emissions from stabilization operations must meet the NESHAP and Idaho dust emission standards. All operations must meet the standard and the document must provide the calculations demonstrating the adequacy of the current design. As described in 40 CFR 61 Appendix D, the facility may conduct screening to determine if dispersion modeling is required. The facility must provide either the assumptions used in the screening or the assumption, inputs and exposure scenario used in an appropriate model. Please note that Appendix B-8 does not address this issue.	No change to the document. The information associated with the NESHAPs modeling for the SSSTF will be included in the 90% ICDF design (update of EDF-ER-290). Appendix B-8 addresses occupational radiological controls (10 CFR 835) and was not intended to address NESHAPs emissions (40 CFR 61).
12	Sec 2.1.4.3.3	2-12	The SSSTF RD must include the design and performance requirements for the decontamination	Humidity monitoring and heaters have been added to the Decontamination Facility HVAC system. Additionally, text was

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
			building off-gas system, including humidity monitoring. Please provide this information.	added to the RD/RA WP and treatment system procurement specification in Subappendix B of Appendix B-1 stating that air introduced into HEPA filter banks for the treatment system must be maintained below 90% relative humidity by utilizing duct heaters, as necessary.
13	Sec 2.1.4.3, 5 <sup>th</sup> bullet	2-13	Please clarify that "Boxes of waste" in this bullet refer to boxes of waste to be treated and not boxes to be filled after completion of the treatment batch since filling to 85% is not acceptable for landfill disposal.	The text was clarified to state that the boxes of waste to be treated are estimated to be 85% full.
14	Sec 2.1.4.3.2	2-14	The RD/RA Work Plan should identify how empty boxes and plastic liners will be handled after dumping of contents. If this information has been included in another portion of this submittal, please reference the location.	No change to the document. The process for handling of empty boxes and liners, both contaminated and uncontaminated, is discussed in the Operations Waste Management Plan in Appendix M.
15	Sec 2.1.4.3.3	2-14	<ul> <li>a) The RD/RA Work Plan should identify how collected dust and solid material will be treated. If this information has been included in another portion of this submittal, please reference the location.</li> <li>b) In addition, identify how used filters will be managed and ultimately disposed. If this information has been included in another portion of this submittal, please reference the location.</li> </ul>	<ul> <li>a) No change to the document. This material will be identified in the ICDF Complex Operations WMP in Appendix M and handled as a secondary waste.</li> <li>b) No change to the document. Used filters will be collected; an HWD will be performed to determine the appropriate disposition pathway.</li> </ul>
16	Sec 2.1.4.3.4, 2 <sup>nd</sup> bullet	2-14	We suggest that the remote station control house should, based upon the nature of the soils mixing operation, be equipped with a "remote" window cleaning apparatus for clear operator viewing.  Otherwise, ALARA principles and treatment efficiencies could be compromised.	No change to the document. The Soil Stabilization System (SSS) process will be totally contained within an air scavenger system enclosure. The remote station control house is located outside this enclosure. All fugitive dust emissions as a result of soil transfer and mixing operations will be totally eliminated by the air scavenger system. Thus, no dust or debris collection is anticipated on the viewing window of the control house. The viewing window is included to be a safety shield in the event of an emergency.
17	Sec 2.3	2-17	a) Please submit the latest edition of the DOE-ID, DOE-ID Architectural Engineering Standards	a) No change to the document. The standards can be accessed by accessing the INEL external homepage at www.inel.gov, then

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
			to IDEQ for your review.  b) The 1996 Uniform Plumbing Code reference is outdated. Please reference the current 2000 edition.	pick the Search Bar and type in <b>DOE-ID Architectural Engineering Standards</b> . The standards will then be the first item on the list and can be reviewed by picking the table of contents.  b) No change to the document. See resolution to comment # 1.d.
			c) Other engineering standards that should be referenced are the AWWA standards in particular C600, C651, C800 and C900; the 1977 Recommended Standards for Wastewater facilities, the 1977 Recommended Standards for Water Works, and the Idaho Rules for Public Drinking Water Systems.	c) No change to the document. See resolution to comment # 1.d.
18	Sec 2.7.3, 2 <sup>nd</sup> bullet item	2-21	<ul> <li>a) Please provide specifications for design and operation of the secondary leak detection systems. It appears long distances or pipe runs are made with minimal detection locations.</li> <li>b) In particular, discuss how the liner under the</li> </ul>	a) No change to the document. The SSSTF Decon building is regulated under 40 CFR 264.1100, containment buildings. 40 CFR 264.1101 (b)(3)(I) lists conditions that satisfy the leak detection through design requirements. The decon building meets these requirements.
			decontamination bldg. will be monitored.	b) No change to the document. There is no direct monitoring of the liner underneath the decontamination facility (see above response). The liner drains directly to the secondary containment area in the wastewater lift station where monitoring will occur.
19	Sec 2.10.2	2-22	All currently known special case wastes that are now at the SSA, or are anticipated to be received at the SSSTF in the future, should be identified in this RD/RD Work Plan.	No change to the document. There are no special case wastes currently in the SSA. If we were able to identify the special case wastes at this time, they would not be special case wastes and included in the WAC.
20	Sec 3.1.1.6	3-2	The pressure sewer line and lift station as described in paragraph 2 does not meet the requirements in Chapter 40 of the 1997 Recommended Standards for Wastewater Facilities.	Similar projects on the Site with low effluent volumes have used 1.5- and 2-inch pressure lines in place of 4-inch pressure lines. The design concepts for this pressure line were discussed with the Regional Office of IDEQ here in Idaho Falls.  The pressure line is 1750 ft from the lift station to the gravity
				sewer manhole that the wastewater will be emptied into. It is estimated that the average daily flow will be 1400 gallon. After reviewing the current design the following

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
				recommendations/changes were made.
				1. Use the 25 gpm pump which is currently specified Use the 2-in HDPE pressure line which is currently specified. See Utility Drawings.
				2. Provide cleanouts on the pressure line every 300-ft or less. They will consist of a "Y" and a standpipe placed in the pressure line so that a high-pressure jet or "snake" could enter the pipe either upstream or down stream. This would provide the opportunity to clean the pipeline in the event the line becomes plugged. The standpipe will be located in manhole that will provide easy access. See Drawing U-26.
				3. Provide a larger volume of storage in the lift station so that the 2-in pipe is completely flushed with each operation of the pump.
				Since there is such a small volume of wastewater, the 25 gpm pump and the 2 inch pipe will be more than adequate to accommodate the flow and still maintain a scouring velocity in the pipe of greater than 2 ft/sec. The 2-ft/sec velocity is the minimum allowed by the Wastewater Standards.
				It should also be noted that the grinder pumps being specified are far superior to those manufactured in the past and there should be no problem with the processed wastewater passing through the pipe.
				Other Site Projects include the TSA-Retrieval Enclosure at the RWMC and the Operations Control Building at RWMC although the pressure lines for these projects are shorter than is being proposed on the SSSTF.
21	Sec 3.2.3.1, para 1	. 3-4	a) The text states that use of bar codes is planned for waste tracking. Please discuss the expected life of the labels and their demonstrated durability given prolonged exposure to the	a) The text was modified by adding the following sentence to the paragraph: "During inspections, barcodes and applicable container labels will be maintained and replaced as needed."
			elements. Discuss the procedure for keeping	b) The text was modified by adding a sentence after ninth

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
			<ul><li>track of the waste or container if the bar code is lost.</li><li>b) As material is treated and processed, discuss how the system will address waste from one</li></ul>	sentence that states "If a waste is processed through stabilization, additional barcodes will be generated for each stabilized waste container. These barcodes will reference back to the original waste container."
			container that is split into several units.  c) Please discuss how reprocessed material will be tracked.	c) The text was modified by adding a sentence after sentence above that states "If a waste container does not meet treatment standards after initial stabilization process, additional barcodes will be generated which will reference back to the initial container."
22	Sec 3.3.1	3-6	a) If the decontamination building pad is not a monolithic pour, then water stops must be provided in the construction joints to satisfy the containment requirements of 40 CFR 264.1101(b)(1).	<ul> <li>a) The slab is going to be post-tensioned to limit cracking. In addition water stops will be installed. The text was modified to add this requirement. See drawing S-2.</li> <li>b) The text was modified to state that the required interior slabs will be coated with a high-grade epoxy coating. See drawing</li> </ul>
			b) Last Sentence: The referenced text states that the building slabs are also coated with a waterproof seal. Please verify that this material can stand up to heavy equipment use, and will be inspected routinely and repaired in a timely manner. If this information and/or commitment has been included in another portion of this submittal, please reference the location.	A-7.  The exterior slabs will be coated with a high-grade sealer.  Operationally, the coatings will be inspected on a regular basis and any repairs required will be done on a timely basis as described in the O&M Plan. A checklist for inspections and repairs will be provided in the O&M Plan at the prefinal inspection.
23	Sec 3.3.1.2	3-6	a) In the discussion of the use of the P trap for the maintenance of the negative pressure in the bldg., clarify how the oil water separator in the road will work to prevent airflow back into the building.	a) The text was clarified to state that the oil/water separator is designed to prevent exterior air from entering the building. A separate vent will be provided from the oil/water separator to the surface to provide ventilation. See drawings U-23 and U-24.
			b) In addition, clarify how the treatment room will be operated with doors being opened and closed still maintaining the negative pressure system.	b) No change to the document. The exterior airtight doors will be closed during treatment operations. In addition the treatment facilities will be self contained and enclosed to maintain the negative pressure. Procedures for operations will be included in the O&M Manual at the prefinal inspection.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
24	Sec 3.3.2, para 2	3-6	The work plan indicates that the pad is not designed with secondary containment because it will not be used to store free liquids. However, Section 2.1.3.8 indicates that the pad will be used to retain any fire water discharged from the SSSTF. Since this water could be contaminated with wastes from the building or from contact with wastes stored on the pad, it would appear that a secondary containment system is needed.	IDEQ withdrew this comment in a correspondence issued to DOE-ID on 11/26/01.
25	Sec 3.3.3 and Sec 3.3.5	3-7	Minimum requirements for the lift station are found in the 1997 Recommended Standards for Wastewater Facilities.	See response to comment #20.
26	Sec 3.3.6.3, 10 <sup>th</sup> and 11 <sup>th</sup> bullets	3-10	It is unclear whether the reference to "product" is meant to mean "treated box". Please clarify.	The text was revised to change "product" to "treated soil".
27	Sec 4, Part 4.3.6.3, 1 <sup>st</sup> para	4-4	This paragraph discusses the leak detection system under the decontamination and treatment pad in the decontamination building. An 8-ounce geotextile is to be laid on the subgrade to protect the 40-mil HDPE liner. No mention is made of subgrade preparation. A 6 to 8 inch lift of selected compacted fill should be placed under this geotextile, free from sharp or otherwise deleterious material.	The text was clarified to state that the fill for the SSSTF will provide a good foundation for the secondary containment fabric and membrane, and no sharp or protruding rocks will be evident.
28	Sec 4, Part 4.3.9, 1st para	4-5	This paragraph states that trucks used for construction are to be decontaminated by "brushing and wiping until all visible traces of soil and soil-related staining have been removed." This provides little assurance that decontamination has been successful. Prior to releasing this equipment, a radiological survey should be conducted on the equipment to minimize inadvertent spread of contamination.	The text was clarified to state that following decontamination, the truck will be surveyed and released by the radiological control technicians.

DOCUMENT TITLE: Draft SSSTF RD/RA Work Plan, Appendix A, TFR-17

ITE	SECTION/		COMMENT	
M	FIGURE/ APPENDI X	PAGE	COMMENT	RESOLUTION
29	Sec 1.6	9 through 12 of 35 general commen t	It would help the reader considerably if the table provided a way to cross-reference the requirement number with the location of the description of that requirement. Since the descriptions in Section 3 are not arranged sequentially, it is difficult to locate this information.	Comment incorporated. The page number of where each requirement is located has been included in the table.
30	Sec 1.6, Assumption A-1	9	Please add the following to the assumption description: "until an acceptable off-site disposal location is identified."	Accepted, change has been made.
31a	Sec 1.6, Assumption O	11 of 35	The purpose of this assumption is unclear. Based on the information in sub-appendix A, the associated requirements have been deleted. Please verify. [NOTE: Original IDEQ comments contained two item 31's. They are shown here as 31a and 31b. Ed.]	Assumption O has been deleted.
31b	Sec 2.1.2	13 of 35	<ul> <li>The following suggestions would improve the flow chart:</li> <li>a) A separate line from the disposal cell to the decontamination building, then to the scale.</li> <li>b) Section 2.3 indicates that, after successful treatment, the wastes will be weighed before going to the landfill. If the re-weigh process will use the main scale, this path should be indicated on this block flow diagram.</li> <li>[NOTE: Original IDEQ comments contained two item 31's. They are shown here as 31a and 31b. Ed.]</li> </ul>	<ul> <li>Flow chart shows the paths noted by comment.</li> <li>a) Box 5.1 (Disposal Cell) flows to 4.1 (Decontamination Area) flows to 1.1 (Transport Scale). No change to Figure 2.1-1.</li> <li>b) Flow path is identified in Figure 2.1-1. No change.</li> </ul>
32	Sec 2.1.2	14 of 35	Please indicate where the off-loading/on-loading area is shown on the plan drawings.	Added text, "These activities will typically take place on one of the storage slabs, but can be performed anywhere inside the perimeter fence as needed."
33	Sec 3.1.2.4, Requireme nt 045 and 046	24 of 35	The requirement reference should be the OU 3-13 ROD.	Comment accepted. Requirement reference changed to, "OU 3-13 ROD."

DOCUMENT TITLE: Draft RD/RA Action Work Plan for the 90% SSSTF, Volume 1; Appendix B-1, Process and Treatment Overview for the Minimum Treatment Process (EDF-296)

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
34	Sec 4.1, list of bullets	8	Section 5.1 states that liquid/sludge waste is anticipated to be utilized within the lab stabilization testing. Please add this as a bullet.	The text was clarified to state that the water used for treatment may include water/sludge waste requiring treatment.
35	Sec 4.1	7	Please clarify the need for the use of the reagents Flyash and Blast furnace slag. These do not appear to provide chemical additives for the stabilization/Pozzalonic chemistry. Please identify what controls are in place to limit their use so that dilution is not the controlling benefit.	The text was clarified to describe the reasons for these additives in the recipe. Fly ash acts as a solid lubricant to provide better mixing in a rather dry environment. The Blast furnace slag has available sulfide to help bind metals. The volume of these two constituents will be very low based on the high waste loading and the low percentage of fly ash and blast furnace slag in the recipe. See Appendix Q for a more detailed discussion of the controls to limit dilution
36	Sec 5.2, last 3 bullets	10	Please specify if the mixer equipment needs to be placed during building construction or whether the overhead door dimensions can accommodate the required equipment access. Specify if the decontamination features are to be built into the mixer unit or if the sprayer reels in the decontamination bay (or other building/ portable features) can handle the task.	See Appendix B for the procurement specification of the treatment equipment Sections 5.15 and 5.2. Spacing requirements are provided including a drawing. A sentence was added in Section 5.1.5 of the procurement specification providing the size of the overhead doors.  Decontamination features will be built into the system for internal decontamination. External decontamination will be performed using the equipment in the building as necessary. The last bullet was modified to state: "The unit shall have self-decontamination features, such as spray wands, or internal washdown systems.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
37	App B, Sec 5.2, 3 <sup>rd</sup> para	B-20	a) The mixer has been tasked with a material cleaning/screening system to keep the mixer free of debris. If this material will be separated from the soil to be stabilized, please discuss how the segregated debris will subsequently be managed, since no size reduction equipment has been specified.  b) Additionally, no description could be found in this Section that describes the equipment/method that will be utilized for unloading the mixer; please augment this Section with these details. If this information has been included in another portion of this submittal, please reference the location.	<ul> <li>a) No change to the text. 40 CFR264.2 – (g) Debris means solid material exceeding 60 mm particle size that is intended for disposal and that is: A manufactured object or plant or animal matter; or a natural geologic material A mixture of debris that has not been treated to the standards provided in by § 268.45 and other material is subject to regulation as debris if the mixture is comprised primarily of debris, by volume based on a visual inspection.</li> <li>268.45 Table 1 footnote 5 states: If reducing the particle size of debris to meet treatment standards results in material that no longer meets the minimum 60 mm minimum particle size limit for debris, such material is subject to the waste-specific treatment standards for the waste containing the material, unless the debris has been cleaned and separated from the contaminated soil prior to size reduction. At a minimum, simple physical or mechanical means must be used to provide such cleaning and separation of non-debris materials to ensure that the debris surface is free of caked soil, waste, or other non-debris material.</li> <li>There is nothing in the debris treatment regs that would preclude screening out material &gt; 6 inches per the design spec as long as the majority of the material after screening is still larger than the 60mm requirement in the definition of debris and would be treated as debris per § 268.45. The text will be clarified in the Operations and Maintenance plan prior to Prefinal Inspection.</li> <li>b) No change to the text. See Paragraph 2 of Section 5.2.</li> <li>a) This is a trade study and was used as an example for Non-</li> </ul>
38	Sub-App A, Sec A-2.2	A-/	a) Please clarify that material screened to <2" will be treated by the stabilization chemistry and be able to pass the TCLP test. Note that if large size material (1", 1 1/2", etc.) are just surface coated, it	a) This is a trade study and was used as an example for Non-Portland Cement, Chemical Methods. See response to Comment # 37 a.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
			does not qualify as process treatment since this material is not debris.	b) As stated in Response to Comment #37 a, the screened material, greater than 6 inches, will be handled and treated as debris from soil.
			b) Also, please discuss the plan for the material >2" that has been separated by screening. This material must be sized reduced for treatment, since one cannot create a new debris waste from this material.	

DOCUMENT TITLE: Draft RD/RA Work Plan for the SSSTF, Appendix B-2, EDF-ER-1730

			: Draft RD/RA Work Plan for the SSSTF	, Appendix B-2, EDF-EK-1730
ITE M	SECTION/ FIGURE/ APPENDI X	PAGE	COMMENT	RESOLUTION
39	General	General	Please identify, in this appendix, where the debris treatment will take place, and where the boxes will be stored during the curing period.	No change to the document. This appendix was developed to describe the debris treatment process selection and design.  Operating requirements will be provided in the O&M Plan in Appendix K.
40	Sec 2.1, 2 <sup>nd</sup> bullet	2-1	The assumption that the "waste is adequately characterized by the generator prior to shipment to the ICDF Complex" does not appear valid in that the majority of the expected debris is already at the ICDF Complex (SSA), and Section 3 states that most of it has not been sampled. This bullet needs to be reconciled with the text.	The text was clarified to state: "Newly generated waste adequately characterized by the generator prior to shipment and requires no pretreatment sampling." Debris waste currently in the SSA in CPP-92, 98 and 99 will be addressed in the RD/RA WP for these sites and will be characterized as required prior to treatment – if necessary.
41	Sec 2.1, Table 2-1	2-1	Please clarify, in the text, the meaning of "inherently hazardous debris."	The text was clarified in the assumptions for inherently hazardous debris to read, "'Inherently hazardous' debris will be treated using the immobilization technologies (i.e., microencapsulation). Additionally "inherently hazardous debris" was defined in footnote a as: "types of debris which will fail TCLP because of their inherent metal content."
42	Sec 5.1, Table 5-1	5-5	Line item for Process Risk, Microencapsulation Column  IDEQ assumes the intent of the statement "Contact with debris is not required," is to convey the position that worker contact with the debris is not required. Obviously, the encapsulation agent has to intimately contact all the debris to make the assertion that the leachability of the hazardous contaminants is reduced. Please modify the entry to clarify that it refers to worker exposure.	The text was modified to indicate that this is referring to worker exposure.

ITE M	SECTION/ FIGURE/ APPENDI X	PAGE	COMMENT	RESOLUTION
43	Sec 6	General	The text should discuss how the proposed technique will comply with the non-empty container provision outlined in the Federal Register, August 18, 1992, Land Disposal Restrictions for Newly Listed Wastes and Hazardous Debris Rule (57 FR 160, p. 37225).	No change to the document. The guidance provided in the August 18, 1992 Federal Register will be used for management of containers. There are numerous forms of debris and EDF-1730 is not intended to identify every form of debris and specify the management for each debris form. Rather, as identified in this Federal Register, ruptured drums are debris (broken or ruptured containers are always debris if contaminated with prohibited waste) and cannot be land disposed until they receive debris treatment. If hazardous waste is removed from the drum during treatment, the waste is subject to the applicable treatment standards for the waste. With respect to the unruptured drums, those that are intact (i.e., those that retain at least 75% of their original volume and can still function as a container) are nonempty containers under Sec. 261.7. The waste in these drums is subject to the treatment standards for the prohibited waste. Those that are not intact (i.e., those that retain less than 75% of their original volume) are debris.
44	Sec 6, 3 <sup>rd</sup> bullet	6-1	Please add verbiage to ensure that the flowable cement grout nozzle will be inserted into the hole in the plastic liner within the box. It is critical that the grout enters and fills this liner to achieve contact with the waste forms.	Text was added to the bullet stating that the nozzle of the grout pump will be inserted into one of the holes in the box and liner.
45	Sec 6.2, 1 <sup>st</sup> para, 2 <sup>nd</sup> to last sentence	6-3	Given the ALARA concerns regarding the debris waste, cold tests should be required to ensure that the 2-foot high boxes will not split open, even if additional screws are used.	The text was clarified to state that additional screws on the 2 ft high box could be installed or the box may be shored as identified for the larger boxes.
46	Sec 6.2, 2 <sup>nd</sup> para	6-3	No mention is made in this document as to whether these braces are re-usable after the grouted box has cured and been landfilled or whether the brace is also landfilled with the box. Please clarify the intent of the bracing and disposition.	The text was clarified to indicate that these braces are reusable.
47	Sec 6.3	6-3	This section currently presents no quality control measures for the proposed microencapsulation technique.  Microencapsulation involves the intimate mixing of the debris and immobilization agent to reduce the leachability of hazardous contaminants. In lieu of TCLP sampling of the treated waste form, quality control of the	No change to the document The proposed microencapsulation process achieves the performance objectives of the debris treatment process while at the same time, minimizes unnecessary exposures to workers (which is an expressed concern from all Agencies). A system operability test will be performed prior to startup to ensure that the process is working

ITE M	SECTION/ FIGURE/ APPENDI X	PAGE	COMMENT	RESOLUTION
48	Sub-App A, Footnote (a)	A-3 thru A-11	microencapsulation process must ensure that the immobilization agent has effectively contacted all of the debris to support the assumption that the leachability of all pieces of debris within the boxes have been reduced. This could be done by visual inspection of the actual debris within the waste boxes following treatment. If the USDOE is unwilling to open the actual waste boxes due to ALARA concerns, the IDEQ is willing to consider results from a statistically relevant set of cold tests that demonstrate the effectiveness of the proposed microencapsulation technique on uncontaminated debris. The cold tests must mimic the container types and waste types of the actual debris that will undergo treatment. A plan for the cold tests should be included in the SSSTF RD/RA work plan, and a process for conveying these results to the Agencies for review must be identified. Footnote (a) states, "The barcodes listed may not be applicable, as the numbers have worn off the exterior of the boxes and were re-numbered. The barcodes will be updated as information becomes available."	adequately. Additional evaluation could be performed during startup to qualitatively assess the grouting process.  The footnote was removed. Remediation of these sites (CPP-92, 98 and 99) will be addressed in the Group 3 soils RD/RA WP.
			<ul> <li>a) This footnote suggests that there is uncertainty regarding which boxes contain which of the described wastes. This is of concern because the stabilization formula and cure time may vary depending on box content. Describe how will this uncertainty be addressed.</li> <li>b) Explain what "information" will become available to rectify this problem, and identify the timeframe for this corrective measure.</li> <li>c) If there is inadequate information to definitively identify the box contents as debris, further characterization is necessary.</li> </ul>	
49	Sub-App A	A-3 thru A-11	Please provide information ensuring that boxes with barcodes 93-617, 96-129, 98-XX1, 15865K, 15866K, 15869K, 15871K, 15872K, 15873K, 15675K, 15876K,	No change to the document. See response to Comment #48.

ITE M	SECTION/ FIGURE/ APPENDI X	PAGE	COMMENT	RESOLUTION
			93-663, 93-686, 94-137, 94-140, 94-179, 94-246, and 94-435 contain greater than 50 percent debris as outlined in the Federal Register, August 18, 1992, Land Disposal Restrictions for Newly Listed Wastes and Hazardous Debris Rule (57 FR 160, p. 37224).	
50	Sub-App A	A-3 thru A-11	Please provide explanation why boxes with barcodes 93-543, 93-555, 93-610, 93-635, and 93-641 are being proposed for debris treatment. The waste description of these boxes indicates that they contain only "soil." Provide information demonstrating that they meet the definition of debris (40 CFR 268.2) and that they contain greater than 50 percent debris as outlined in the Federal Register, August 18, 1992, Land Disposal Restrictions for Newly Listed Wastes and Hazardous Debris Rule (57 FR 160, p. 37224).	No change to the document. See response to Comment #48.

DOCUMENT TITLE: Draft SSSTF RD/RA Work Plan, Appendix B-3, Sanitary Lift Station, EDF-1937

ITEM	SECTION/	PAGE	COMMENT	RESOLUTION
	FIGURE/			
51	APPENDIX General	General	a) Sanitary sewer pump design	a) The EDF was modified to replace Table 6.4 with Table 7.3.
			references table 6.4 from the UPC. Please use the information for	b) The INTEC WTP was designed for 80,000 gpd of waste water.
			sanitary design for table 7.3 of the UPC.	Currently there is between 40,000 and 50,000 gpd being sent to the WTP. The system has adequate hydraulic capacity for the estimated 1,400 gpd from the SSSTF.
			b) The design file note needs to provide information relative to the INTEC wastewater treatment plant Wastewater Land Application Permit (LA-000115). The INTEC WWTP shall have adequate treatment capacity to treat wastewater generated at the SSSTF and maintain compliance with WLAP permit LA-000115.	During April and May of 2001, the plant was modified to install new slide gates to control the flow through the plant and provide for better treatment of the wastewater. In addition, two aerators were installed in pond 3 to aid in the stripping of the Nitrogen. These are in addition to the existing aerators located in ponds 1 and 2. These modifications were implemented to eliminate exceedences of Total Nitrogen in the effluent and were reviewed and approved by IDEQ prior to construction. Since these improvements were made, there have been no exceedences of Total Nitrogen in the effluent of the treated wastewater.

DOCUMENT TITLE: RD/RA Work Plan for WAG 3 SSSTF (Draft), DOE/ID-10889, Appendix B-4 (EDF-2655), Appendix B-6 (EDF-2648), and Appendix B-7 (EDF-2676)

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ITE	SECTION/	PAGE	COMMENT	RESOLUTION		
M	FIGURE/					
	APPENDI			·		
	X					
52	General	General	The Professional Engineer stamps in these appendices are not signed. Please ensure that these signatures are obtained prior to finalization of this document.	All pertinent documents will be stamped and signed by the appropriate Professional Engineer registered in the State of Idaho prior to finalization of the RD/RA work plan.		

## DOCUMENT TITLE: Draft SSSTF RD/RA Work Plan, Appendix B-4, Utilities Raw Water and Potable Water, EDF-2655

- v au	water, EDF-2035						
ITEM	SECTION/	PAGE	COMMENT	RESOLUTION			
	FIGURE/						
	APPENDIX						
53	NA	5	a) Page 5. The potable water design criteria needs to provide documentation that adequate water is available at the three-inch	a) The EDF has been modified to state that the design is based on peak flows and will meet the potable water demands of the SSSTF. See EDF 2655 (pg 5 of 5) for clarification.			
		General	interconnection to meet system demand at the peak hour on the peak day.	b) The fiberglass water line was designed and installed in accordance with the Uniform Plumbing Code at about 1981. This pipe is part of the existing facility. Familian, (Pipe Supplier) stated that the FRP pipe should be in very good condition as the FRP is very durable - even more			
		General 2	b) Please provide documentation that the existing three-inch fiberglass water line meets AWWA standards.	so than stainless for this application. They recommended cutting a section of the FRP pipe and flanging both ends then installing a HDPE tee connection. Plans have been modified to give the subcontractor guidance on procedure.			
			c) Will the potable water system be used for lawn sprinkling? If so, this may affect the design.	c) No change to the document. The potable water system will not be used for lawn sprinkling. There are no lawns planned for this facility.			
			d) Raw water, page 2. Design calculations need to be provided when both systems are experiencing peak day and peak hour, specific design flow information is needed for this project.	d) No change to the document. The raw water system is independent of the potable water system. The design is based on peak design flows and demonstrates what flow can be delivered for a given pressure. See EDF 2655 (pgs 3 & 4) for supply table and curve.			

DOCUMENT TITLE: Draft SSSTF RD/RA Wok Plan, Appendix B-6, Minimum Infrastructure, and

**Process Systems, Drain Pipe Sizing, EDF-2648** 

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
54	General	General	<ul> <li>a) The design time of 30 minutes seems to be short, as compared to domestic fire flow design of two hours.</li> <li>b) If there is a major fire and the anticipated flows described in appendix B-5 are generated as wastewater, what prevents these flows from overloading the collection and treatment system described in Appendix 6?</li> </ul>	See resolution to comment #6.

DOCUMENT TITLE: RD/RA Action Work Plan for WAG 3 SSSTF (Draft), DOE/ID-10889, Appendix B-8,

Radiological Control Analysis, EDF-ER-302

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
55	Part 2, para 5	2-2	This paragraph describes how a negative pressure will ensure confinement, with the exhausted air passing through HEPA filters. How will this negative pressure be maintained in the event of a loss of electrical power to the facility? A backup temporary power source (small generator) should be staged on-site to provide power to the necessary blowers to prevent a potential breach of contamination confinement.	The following was added at the end of paragraph 5: "In the event of loss of power or failure of the ventilation system, the process may need to be shut down."
56	Part 3	3-1	This part describes the potential radiation sources that will affect the truck drivers. It is possible, during situations where trucks a in a queue, that drivers will be exposed to external sources other than the truck they are driving. Additional radiological controls should be outlined to prevent this situation. A possible solution is to define a minimum separation distance between trucks in a queue.	The following was added at the end of paragraph 5: "These exposure rates are for personnel located external to the trucks."  The safety issues related to the transport of wastes to the ICDF will be identified and covered by the appropriate waste generator's RD/RA work plan.

DOCUMENT TITLE: RD/RA Action Work Plan for WAG 3 SSSTF (Draft), DOE/ID-10889,

Appendix B-11, Road and Pavement Ballast Requirements, EDF-1930

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
57	Calculation Cover Page, "Assumptions"	1 of 6	Assumption 3 states that a "Medium Vehicle Classification" was used. Please verify that this assumption encompasses the largest vehicular traffic anticipated for use on these roadways, such as the 15 cubic yard dump trucks.	The low, medium, and high vehicle classifications for pavement design are criteria developed by the Idaho Transportation Department (ITD). These criteria are developed for various classes of highways. The low classification is for state and county secondary roads with the lowest truck volumes. The medium classification is for medium volume, primary-type highways with higher truck volumes. The ITD Design Guide reserves the high classification for interstate highways with very large truck volumes. Each classification equates 2-axle trucks (dump trucks) and 5-axle trucks to 18,000 lb equivalent single-axle loads (ESALs). Using these data and the soils classification data, ballast requirements are developed. The actual ballast or combined thickness of pavement layers exceeds the ballast requirements for the SSSTF project. On the last page of EDF 1913, 1.75 ft of gravel equivalent is listed as the actual ballast and 1.36 ft is listed as the required ballast.

## DOCUMENT TITLE: RD/RA Action Work Plan for WAG 3 SSSTF (Draft), DOE/ID-10889, Appendix C,

**Design Specifications, SPC-1485** 

	<del></del>	· · · · · · · · · · · · · · · · · · ·	3PC-1403	
ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
58	Sec 01051, Lines 16 and 23	1 of 3	These lines state that the surveying be accomplished, and certified by a professional land surveyor. Please add verbiage to ensure that these individuals are registered in the state of Idaho.	The specifications have been modified to require the professional land surveyor be licensed in the State of Idaho. See page 1 of spec 01051.
59	Sec 02486, Line 31	1 of 3	Please add verbiage to state that the mulch shall be free of noxious weeds and other deleterious materials.	The specifications have been modified to require that mulch be free from noxious weeds and other deleterious materials. See page 1 of section 02486
60	Sec 02598	2	The secondary containment system is specified to have a minimum thickness of HDPE of 40 ml. Please justify this minimum thickness, as a greater thickness may be appropriate.	No change to the document. The liner requirement for PCB storage is 30 mil. This exceeds that requirement and is sufficient for secondary containment. A thicker liner would increase difficulty of installation.
61	Sec 02598, Line 3	2 of 13	Please add verbiage that states that these liner components are described in order, from the bottom up.	The specification has been modified to state that the liner components are described in order, from the bottom up. See page 2 of 3 of spec 02598.
62	Sec 02598, Line 33	5 of 13	Please remove the words "where possible" from this sentence. Protection of the packaged HDPE liners must be provided at all times, not only "where possible".	The words "where possible" have been removed from this sentence.
63	Sec 02713	1	a) Page 1: This section needs to specify compliance with ANSI/NSF standard 61 for all potable water supply components.	a) This section has been changed to specify compliance with ANSI/NSF standard 61 for all potable water supply components.
		1	b) Page 1: Please expand your references to AWWA standards to include C-900, C-905, C-800.	b) These appropriate references have been specified.
		2	c) Page 2: Please add a note cross-referencing the IDAPA numbers for the Idaho Regulations for	c) Appropriate cross-referencing has been made to IDAPA 58.01.08.
			Public Drinking Water Systems. The new number is 58.01.08.	Fire Water will be shown in accordance with the variance allowed in the April 8, 1991 letter from Richard P. Donovan,
		5, 6	d) Page 5 and continued on Page 6, Potable Water Specifications: This section does not comply with IDAPA 58.01.08.550.06.e and g.	then director of Dept of Health and Welfarc. A copy of this letter was given to IDEQ on Nov 13, 2001
		General	e) Acceptable leakage for pressure testing the water	e) During the testing of the pipe line, no pressure drop is allowed. See page 6 of 7 of spec 2713.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
			main needs to be specified.	
64	Sec 02722	l	a) Page 1: Please specify the 1997 Recommended Standards for Wastewater Facilities.	a) The 1997 Recommended Standards for Wastewater Facilities have been specified.
		3	b) Page 3: Please include a reference to the ASTM specification for the sanitary sewer pipe. Also, please verify the gasketed joint ASTM reference F477.	b) A reference to the ASTM specification for the sanitary sewer pipe has been made. ASTM reference F477does not apply for the HDPE pipe being specified.
				c) See resolution to comment #20.
		3 thru 5	c) Page 3 through 5: The lift station and pressure	
			main is to comply with the 1997 Recommended Standards for Wastewater Facilities.	d) See resolution to comment #63.
		6	d) Page 6: Separation of potable water and non-potable water lines do not meet our regulation, see above comment d) in Section 02713.	e) Leakage for testing is specified in accordance with the "1997 Recommended Standards for Sewage Works" Paragraph 33.94 of the "1997 Recommended Standards for Sewage Works" has been incorporated into the spec. (See page 02722 7-of 7.
		7	e) Page 7: An acceptable amount of leakage for testing the sanitary sewer main and pressure lines needs to be defined and shall not be greater than the amounts specified in the 1997 Recommended Standards for Sewage Works.	
65	Sec 02732	General	a) Please submit justification on why this design does not comply with the 1997 recommended Standard for Wastewater Facilities.	<ul><li>a) See resolution to comment #20.</li><li>b) See resolution to comment #63.</li></ul>
		6	b) Page 6: See above comments on potable water main separations – comment D in Section 02713.	c) Comment noted.
		6	c) Page 6: You may want to specify non-corrosive pipe and fittings for the list station.	d) Pressure testing shall comply with section 02733 of the specs
		7	d) Page 7: Please specify an acceptable amount of leakage for the piping.	
66	Sec 02733, Line 13	3 of 3	This line states that raw water may be used to perform the testing. This is not consistent with line 19 on page 2 of 3 of this specification that states only potable water	The specification was clarified to state that potable water shall be used to test the piping.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
			is to be used as the test medium. Please clarify why raw water may be used.	
67	Sec 09900, Lines 30 thru 46 Lines 1 thru 8	3 of 9 4 of 9	No mention is made of glass bead requirements associated with the pavement marking paint.  Please include these requirements, and ensure that they are consistent with the Idaho Transportation Department (ITD) requirements.	Glass beads were specified for use in the pavement striping paint.
68	Sec 15480	2	Page 2: Please specify the sampling is for fecal or total coliform bacteria, and no coliforms should be found.	The specifications were revised to state that sampling is for fecal or total coliform bacteria, and no coliforms should be found.

DOCUMENT TITLE: RD/RA Action Work Plan for WAG 3 SSSTF (Draft), DOE/ID-10889, Appendix D –

Design Drawings, Phase 1, Minimum Infrastructure

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
69	NA	Sheet S-2	Detail 5 on this Sheet provides a cross-section of concrete floor joinery with the two inch keyed feature (one inch offset). The detail does not include a waterstop feature. Although a liner is positioned under the concrete flooring, the inclusion of a waterstop in all exposed, concrete joinery areas subject to contaminated waters is an inexpensive water barrier.	The design has been modified to add a waterstop feature to concrete joinery areas. See detail 2 on dwg S-2.
70	NA	Sheet S-6	The drain system for the truck scale is illustrated on this Sheet with three (3) floor drains provided. This is a good design. However, please consider providing a weighted filter fabric (or some other accessible /removable device) to prevent drain clogging.	The design was changed to install electronic load cells are rather than the mechanical scale. This is based on an EPA comment.
71	NA	Sheet P-3	This Sheet illustrates the sanitary and service waste (water) floor plan. If debris treatment is to be located within this building, please indicate what area (and what drains) will be utilized to collect and manage the "weep" (water) from the grouted boxes, decontamination of grouting equipment and, if reusable, bracing, etc.	No change to the document. Weep water will be managed the same as decontamination water and will be piped to the Evaporation Pond.
72	H&V Flow Diagram	Sheet HV-1	<ul> <li>a) Since the decontamination bay (and any other area that will house decontamination activities) will generate aerosols/ mists from the high pressure water sprays used, please indicate how the Exhaust Inlet (rated at 2294 CFM) will be protected.</li> <li>b) In addition, as a functioning air handling system designed to maintain a slightly negative air pressure inside the decontamination area, an air balance calculation for the decontamination</li> </ul>	<ul> <li>a) Humidstats and heaters have been added to the HVAC design to keep the relative humidity below 90%. See drawing HV-1.</li> <li>b) No change to the document. Since there is no supply fan, any air exhausted from the building will result in a negative pressure.</li> <li>c) The drawings were modified to change the fan numbers and sequence of operation as necessary.</li> </ul>
			bay is net zero. Assuming that the overhead doors are not "air-tight", the draw by the exhaust (fan) will need to be increased to attain	d) No change to the document. Operation procedures will dictate whether doors need to be closed. Therefore an

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
			<ul> <li>a negative (into-the-building) flow.</li> <li>c) Please also note that the Sequence of Operation notes (5,6,&amp;7) need to be reviewed for accuracy.</li> <li>d) Also, an interlock system tied between the overhead doors, the high-pressure spray reels, and the exhaust fan appears prudent in the decontamination bay. Please comment.</li> </ul>	interlock system is not necessary.
73	NA	Sheet A-1	Although this may be a consequence of timing between drafting and recent engineering plans for the stabilization area, the floor plan does not reflect the remote control room, the mixer, etc. Please update. Additionally, this area is extremely small for providing the type(s)of activities contemplated. In reviewing the mixer location details (in other documents), it is unclear how the mixer will be unloaded after a batch (orientation, receiving container position, auger(s) or conveyors contemplated, etc. and how this floor plan will accommodate additional equipment. Please explain.	No change to the document. The floor plan including the treatment equipment is found in Appendix B-1, Subappendix B. The drawings in Appendix D are design and construction drawings for the building only.
74	NA	Sheets A-5 and A-6	On both Sheets, the interior wall panels (vertical and roof) are detailed. Please add detail showing the joinery between each panel is caulked.	n The specifications have been modified to require the joints to be caulked. See line 26 of Section 07901.
75	NA	Sheet A-1	a) Although this may be a consequence of timing between drafting and recent engineering plans for the stabilization area, the floor plan does not reflect the remote control room, the mixer, etc. Please update. b) Additionally, this area is extremely small for providing the type(s)of activities contemplated. In reviewing the mixer location details (in other documents), it is unclear how the mixer will be unloaded after a batch (orientation, receiving container position, auger(s) or conveyors contemplated, etc. and how this floor plan will accommodate additional equipment. Please explain.	See Response to Comment # 73.
76	NA	Sheets A-5	On both Sheets, the interior wall panels (vertical and	See Response to Comment # 74.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	R	ESOLUTION
		and A-6	roof) are detailed. Please add detail showing the joinery between each panel is caulked.		
77		Sheet U-1	a) Sheet U-1: It would be helpful to identify where the specific utilities are to be located.	a)	Specific utilities have been spelled out on drawing U-1 and the legend on this drawing.
		Sheet 8-1	b) Sheet 8-1: Please explain the purpose of the enlarged plan shown on U-12.	b)	No change to the design. This shows the ductbank from Communications Manhole MAH-FE-265 to communications manhole MAH-FE-266. Reference from U-1. The enlarged
		Sheet U-2	c) Sheet U-2: Detail 11/U-15 and 9/U-15 is not shown on sheet U-15.		plan is currently on dwg U-24.
		Sheet U-2	d) Sheet U-2: All dead-end water mains are to be equipped with a means of flushing.	c)	Detail 11/U-15 is now detail 28/U-26 on dwg U-2 and detail 9/U-15 is now detail 27/U-26.
		Sheet U-2	e) Sheet U-2: Note 3 does not meet minimum specification distances for water and non-potable mains.	d)	No change to the document. The intent is to tie these lines into the ICDF project and will not be dead-ended when operations begin.
		Sheet U-4	f) Sheet U-4: Please show the clean water line	e)	See resolution to comment 63-d
			crossing the percolation pond SW lines in the profile views meets minimum vertical separation	f)	This detail has been clarified to be encased in concrete.
			requirements.	g)	Yes, the direction arrow is correct. Dwg U-1 has been changed to clarify the sheet locations.
		Sheet U-5	g) Sheet U-5: Is the direction arrow correct?	h)	See resolution to comment #63-d
		Sheet U-6	h) Sheet U-6: The ten-foot horizontal separation between the clean water line and other utility line is not being maintained.	i)	Detail 5/ U-13 has been changed to 24/U-25. See Grid B-5 on U-25.
		Sheet U-6	i) Sheet U-6: Detail 5/U-13 not provided.	j)	See details in the plan on Dwg U-2. See resolution to comment #63-d.
		Sheet U-15	j) Sheet U-15: The minimum horizontal separation is not being shown on detail 11/U-2.	k.	See resolution to comment #20.
		Sheet U-15	k) Sheet U-15: As noted, the lift section is to meet the requirements found in the 1997 recommended Standards for Wastewater Facilities.		

DOCUMENT TITLE: RD/RA Action Work Plan for WAG 3 SSSTF (Draft), DOE/ID-10889, Appendix E "SSA Drawings and Specifications"

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
78	Sec 02200, Lines 38 and 39	2 of 4	These lines state that compaction shall be to 95%. Please define this requirement further, such as compaction shall be to 95% of maximum dry density.	No changes will be made to the SSA specifications since they were written for construction of the SSA that occurred during the summer of 2000. However, the specifications for the SSSTF construction in Appendix D have been revised on sheets 5 of 6 and 6 of 6 to require compaction to 95% of maximum DRY density.

DOCUMENT TITLE: Draft RD/RA Action Work Plan for the 90% SSSTF: Volume 1; Appendix F – Preliminary Inspection Plan for SSSTF Construction Activities (INEEL/EXT-01-00777)

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
79	Sec 2.2.5, 1 <sup>st</sup> sentence	4	This sentence implies that the contractor's representative will be at the factory observing all of the pre-cast/pre-stressed concrete items to be installed at the SSSTF. Please clarify.	Revised the text to indicate that the contractor's representative will witness the first pre-cast/pre-stressed concrete items and may perform surveillance of the subcontractor during completion of the balance of the order.
80	Sec 2.3.1	4 and 5	Please clarify that if more than one welder is utilized for a specific event (field joints, field repairs, etc.) that the contractor's representative will randomly witness these events or a contractor's representative (if necessary, more than one) will witness all of the listed events if occurring simultaneously.	The following text was added: If more than one welder is used for a specific event (field joints, field repairs, etc.) the contractor's representative(s) will witness all of the field joints or repairs unless random surveillance is allowed by the detailed inspection plan.

DOCUMENT TITLE: Draft RD/RA Action Work Plan for the 90% SSSTF; Draft SSSTF RD/RA Work Plan, Volume 1, Appendix I – Stormwater Pollution Prevention Plans (PLN-933 & PLN-938)

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
81	General	General	The drawings for both Plans are very difficult to review due to their small size. For example, silt fence locations for disturbed areas are not legible. Please provide larger Drawings.	Added 11 x 17 drawings.

## DOCUMENT TITLE: Draft RD/RA Action Work Plan for SSSTF, Appendix J, Waste Acceptance Criteria, DOE/ID-10881

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
82	Nomenclature	xv thru xvii	Soil Waste: This definition is too limited. Any contaminated soils that exceed RBCs and require excavation are considered "soil waste."	Definition was changed to include exceedance of RBCs.
83	Sec 1.1, Bullet 1	1-2	Not all wastes placed within the ICDF Complex will be destined for disposal on-site; some wastes will be transshipped or re-packaged and transported off-site. Please modify to include this function.	A bullet was added that states that off-site disposal is an option.
84	Sec 1.4.3	1-6	As stated in previous comments on the on the 30 percent SSSTF RD and the 30 percent ICDF RD, it is the responsibility of the WAG-3 remedy to ensure that the wastes accepted into the ICDF have been adequately characterized by representative samples. This should be a stated function of the ICDF Complex WAC.	Section has been added that discusses the duties of the ICDF waste generator waste personnel.
85	Sec 1.4.3, 2 <sup>nd</sup> para, 2 <sup>nd</sup> sentence	1-6	The referenced sentence refers to an "example" waste profile, while the form found in appendix D is stamped "sample." The RD/RA Work Plan must include a copy of the actual form that will be used by the USDOE for implementation of the remedy. If there is a need to change the layout or contents of the form after the RD/RA Work Plan, the changes would be negotiated with the Agencies through the FFA/CO process to modify a primary document.	Since the waste tracking system has not yet been selected, the exact report form has not been determined. All the information required for entrance into the ICDF complex is on this form. The reporting format may change.
86	Sec 1.5.2, 5 <sup>th</sup> bullet	1-8	The work plan should describe how audits will be conducted, and identify their frequency.	This bullet was deleted. Audits will be performed with company procedures for self-assessments.
87	Sec 1.5.3, 5 <sup>th</sup> bullet	1-9	The criteria for determining whether a sampling and analysis plan is needed should be included in this document.	DOE/ID-10960 addresses this issue. Appropriate SAPs will be developed with the associated generating RD/RA work plan. No change to document.
88	Sec 1.5	1-6 thru 1-9	The IDEQ continues to have significant concerns regarding waste characterization. There is little in the way of specific sampling requirements presented in this 90 percent document. The text minimizes the WAG-3 Agency input into the waste characterization process, and defers all decision-	DOE/ID-10960 addresses the level of characterization that will be required for each waste stream. The ICDF waste generator personnel will be at the dig site verifying the waste.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
			making authority regarding sampling needs for ICDF complex acceptance to the "ICDF Complex Management." This is not appropriate. As discussed during the June 18-20, 2001 comment resolution meeting, the Agencies shall approve all waste profiles for acceptance in the ICDF. These profiles will include the characterization sampling results. Obtaining agency approval/disapproval during this aspect of the remedy is not significantly different from approving risk assessments and remedy selections, or approving off-site disposal locations for other remedies. The new estimate of ICDF waste (483,000 cubic yards) derives from 43 sites. Over the intended ICDF operational period, obtaining Agency approval of 43 waste profiles (or even triple that amount) would not be an onerous issue. The Agencies can develop an efficient approval process. Specific comments regarding the waste profiling and verification steps are also provided in this submittal.	
89	Sec 1.5.3, last bullet	1-9	It is unclear what is entailed in a "management self-assessment of the WAG data validation process during waste receipt at the ICDF," or to what the "agency-approved data validation" refers. Both of these references should be clearly defined and described in the text.	The bullet has been deleted due to the Development of DOE/ID-10960.
90	Sec 1.5.4	1-9	As discussed during the June 18-20, 2001 comment resolution meeting, the Agencies shall approve all waste profiles for acceptance in the ICDF. These profiles will include the characterization sampling results. In addition, Agency concurrence must be sought on all "Special Case Wastes" which involve any exceptions to criteria contained in finalized RD/RA documents. Also, the following operational data should be submitted to the Agencies: notification of any unexpected waste found during construction, notification and	This section has been deleted due to the development of DOE/ID-10960.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
			information of any waste that differs significantly from profiles developed based on previous investigations, notification and information regarding any waste that fails treatability studies, notification and information of any wastes failing the WAC, and waste failing the microencapsulation or stabilization processes. The agencies should be recognized as part of the ICDF Complex management team during the initial phases of ICDF operation.	
91	Sec 1.5.4, last sentence on page	1-9	Please refer the reader to the location in the 90 percent RD/RA WP of the referenced quality assurance plan that outlines the data quality objectives and procedures for the ICDF Complex. From an oral inquiry the IDEQ made during the review period, it was-learned that the cited text refers to Appendix A entitled Landfill Data Evaluations Guidelines, located in the back of Appendix K which is the Operations and Maintenance Plan. Better cross-referencing in the text of documents within this submittal is needed.	The referenced document has been incorporated into the WAC. References will be checked throughout and will be updated as required.
92	Sec 2.1, 3 <sup>rd</sup> bullet	2-1	The waste verification process continues to appear inadequate. This bullet refers to Section 3.7. The explanation for Box 7 of Figure 3-1 states that the waste will be "verified during the remediation excavation and/or loading process to ensure that the waste matches the submitted waste profile." However, Section 3.7 appears to focus only on verifying whether the waste is packaged appropriately. The verification sampling must be of sufficient type and sensitivity to verify the information on the waste profile, not simply whether an appropriate container has been used. Please see also Comments #102 and #103 regarding verification sampling.	DOE/ID-10960 discusses the level of verification and the appropriate instrumentation.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
93	Sec 2.2, Table 2-2	2-2	Table 2-1 states that some non-hazardous/non-radioactive solid waste may be accepted into the ICDF Complex rather than the Central Facilities Area (CFA) Bulk Waste landfill. The reason for so doing is unclear. Please explain the justification for the acceptance of non-hazardous/non-radioactive solid waste at the ICDF Complex.	This statement is just to allow for the disposal of some waste stream that may not have a disposal path anywhere else within the INEEL. It would be identified as special case waste and would have to be approved through the process outlined in DOE/ID-10960.
94	Sec 2.2.1	2-3	Agency concurrence must be sought on all "Special Case Wastes" which involve any exceptions to criteria contained in finalized RD/RA documents.	Waste streams will be sent through the process outlined in DOE/ID-10960. However, there may be instances when a waste is outside the WAC, such as a container that will go through the special case process and will not require Agency approval. No change to document.
95	Sec 2.4.1, 1 <sup>st</sup> bulleted list	2-4	It is unclear why validated analytical data from the actual waste is not at the top of the list of types of acceptable knowledge. As written, the text appears to focus heavily on all avenues of knowledge other than analytical sample results for the waste in question. This apparent bias is not appropriate.	This is a bullet list, not a numbered list in order of priority.  There is no bias indicated in the list. No change.
96	Sec 2.4.1, 2 <sup>nd</sup> bulleted list	2-4 thru 2-5	The value of some of the bulleted items is not apparent, nor why it would be required to supplement actual analytical data of the waste. More information is required in the text to specify the value, for characterization purposes, of the following: logbooks (i.e., specify the type of logbooks), procurement records (specify for what sort of item this is of value), radiation work packages (since this is not a document that the Agencies are familiar with, the text should explain the value of this package for characterization purposes), procedures and/or methods (specify what sort of procedures/methods the bullet is referring to), process flow charts, inventory sheets. The last two bullets are extremely subjective regarding input and calculation assumptions, and will require Agency approval.	These types of information are adequate to complete/supplement characterization efforts on the waste profile. Agencies will have reviewed and accepted the waste streams through the process outlined in DOE/ID-10960. It is DOE's responsibility to ensure waste disposed in the ICDF Complex meet the appropriate WAC. As a check, the Agencies are encouraged to be present at the Complex or audit as needed. No change to document.

ITEM	SECTION/	PAGE	COMMENT	RESOLUTION
	FIGURE/			
	APPENDIX			
97	Sec 2.4.2, 4 <sup>th</sup>	2-5	This paragraph appears to be indicating that if the	Hazardous waste determinations will be made as required in 40
	para under		constituent concentrations are "low enough," the	CFR 264.20 through 24. If a listed a waste code is attached to a
	section		listed waste code will not be applied. If so, this is	waste it will be carried through as required. The text will be
	heading		not an acceptable approach. If process knowledge	clarified.
			indicates listed waste constituents are present in a	
			process and there is a release from that process, the	
			mixture rule states (IDAPA 58.01.05.005 [40 CFR	
			§261.3(a)(iii-iv)]) that the listed code applies to the	
			waste. If the concentrations, based on initial and	
			routine follow-up sampling, are less than the	
			appropriate land disposal restriction concentration	
			based treatment standard, the waste can be certified	
			and accepted for land disposal. However, the listed	
			waste code must still be applied to the disposed	
			waste (unless the INEEL pursues a delisting petition	
			or a no-longer-contained-in determination if the	
			waste is a contaminated media). If the listed waste	
			has a technology based treatment standard, the	
			waste must be treated prior to land disposal. The	
	- th		paragraph should be re-written for clarity.	`
98	Sec 2.4.2, 5 <sup>th</sup>	2-5	The IDEQ disagrees with the statement that	Sentence has been deleted.
	para under		operator interviews can not be used as a sole basis	
	section		for an affirmative listed waste determination.	
	heading		Process knowledge is the primary basis for making	
			a listed waste determination and an operator	
			interview is a form of process knowledge. One data	
			source is sufficient justification to place a listed	
			code on a waste stream since waste characterization	
			determinations based on process knowledge must	
			be conservative. The IDEQ believes that multiple	
			corroborating interviews constitute verification of	
			the presence of a listed waste. In the absence of	
			corroborating data, the IDEQ and USEPA must	
			concur with the facility's determination before the	
			listed code may be removed from the waste.	

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
99	Sec 2.4.4, 2 <sup>nd</sup> bullet	2-6	Any special case waste that DOE intends to characterize through an alternative management path requires Agency concurrence.	Any special case waste, which is outside the chemical and/or radiological characteristics of the waste, will have a Summary Waste Approval Form (SWAF) prepared for Agency approval.
100	Sec 2.5.2, 3 <sup>rd</sup> para	2-7	The Third Paragraph states: "Both direct and indirect methods can be used for radiological characterization. Indirect methods (i.e., methods other than direct measurement of a given radionuclide) are acceptable as outlined in the Federal Register, November 20, 1997, Clarification of RCRA Hazardous Waste Testing Requirements for Low-Level Radioactive Mixed Waste-Final Guidance, (62 FR 224)." This statement is followed by two quotations, which discuss RCRA hazardous waste testing requirements. (Note: the quotations are not properly cited, thus the reviewer is forced to search the text in order to determine the context of the selected quotation.)  The referenced guidance document, issued jointly by the Nuclear Regulatory Commission and Environmental Protection Agency, was targeted at NRC licensees who routinely generate mixed waste as a result of ongoing site activities, not site remediation. The only discussion of characterization of the radiological component of the waste is found on page 62085 (62 FR 224) where the NRC and (US) Department of Transportation requirements are discussed. The IDEQ did not find any statements addressing direct or indirect radiological characterization in this guidance document. Instead, the two quotations are directed at the hazardous constituent characterization requirements rather than the radiological characterization that is the subject of Section 2.5.2. This paragraph should be re-written, eliminating references to hazardous waste	We reserve the right to use process knowledge to reduce or eliminate worker exposure to radiation hazards.
			characterization issues.	

ITEM	SECTION/	PAGE	COMMENT	RESOLUTION
	FIGURE/			
	APPENDIX			
101	Sec 2.5.2, 4 <sup>th</sup>	2-7 thru	a) This paragraph does not state how the facility	Waste characterization processes outline in the RCRA
	para	2-8	will characterize the radiological component	regulations were not developed to address radiological
			of the waste. Each bullet contains	characterization. The RCRA regulations will be met for
			non-mandatory language so that the facility	hazardous characterization; however, radiological
			can or may conduct a number of	characterization can be done as effectively by indirect means as
			characterization activities, but is not bound to	through "analytical" results. Radiological concentrations do
			conduct any of the proposed options. The first	decay on a mathematically recognized progression which is well
			sentence should read: "One or more of the	known. Therefore use of this knowledge is acceptable and an
			following characterization methods will be	industry standard for determination of rad content.
			used to establish the radionuclide inventory of	
			the waste."	a) The Summary Waste Approval Form details the level of
			b) The text appears to focus heavily on all	characterization necessary for the waste to be sent to the
			avenues of knowledge other than analytical	ICDF Complex. (DOE/ID-10960)
			sample results for the waste in question. This	
			apparent bias is not appropriate.	b) The basis is apparent. Not all waste streams require
			c) The isotopic composition and activity of the	analytical data, and in some cases, process knowledge will
			radionuclides in the waste should be	have to be used to avoid unnecessary exposures.
			periodically monitored to ensure consistency	
			with the source term found in the NESHAPs	c) Pond sampling will be done to comply with the NESHAP
			model.	requirements. If an adjustment is necessary to the model, it
			d) First Bullet: Process knowledge, with routine	will done as required by the NESHAP regulations.
			direct measurement verification at statistically	D D D T T D 100 (0 1 11 1 1 1 1 1 1 1 1 1 1 1 1 1 1
			appropriate intervals approved by the	d) DOE/ID-10960 details the level of verification necessary.
			Agencies', is an appropriate method for	
			developing the inventory. Process knowledge	e) Gross radiation measurements are an industry standard. The
			without verification is unlikely to be accepted	measurements will be taken according to the instrument
			by IDEQ.	procedures and the INEEEL RadCon Manual.
			e) Second Bullet: More information must be	0. DOE/ID 100/0 11 11 A 11 A 11
			provided regarding the proposed use of gross	f) DOE/ID-10960 allows the Agencies to accept the waste
			activity measurements and scaling factors. In	stream.
			addition, measures of gross activity must be	D. J.
			routinely corroborated with radionuclide-	g) Development of DOE/ID-10960 addresses this issue.
		•	specific analysis. f) Third Bullet: The IDEQ cannot concur with	
			this description because it lacks sufficient	
			detail to be meaningful. Any use of computer	
			modeling for waste characterization purposes	
			modernig for waste characterization purposes	

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
			will be evaluated by the Agencies on a case-by-case basis during the waste profile approval process.  g) Fourth Bullet: The statement that "Other methods of radiological characterization could be used, but must be clearly documented and approved by the ICDF Complex Management," is too vague to be meaningful. As stated above, the Agencies will evaluate and approve the waste profiles, which will include associated characterization data. Therefore, such characterization methods will be approved by the Agencies on a case-by-case basis.	
102	Sec 3.1, Boxes 2 and 3	3-1	The IDEQ continues to be concerned with completing waste profiles prior to excavation. As stated in our November 30, 2000 comments on the SSSTF 30 percent Remedial Design (comment 7) and our May 25, 2001 comments on the ICDF 30 percent Remedial Design (Comment 120), investigation data used for remedy selection may not be representative of remediation wastes encountered once excavation occurs. This is especially true for sites at which the area of suspected greatest contamination was inaccessible for sampling due to buried pipes/utilities and/or structures, or for sites at which there were no surface indications of hotspots. Therefore, the Agencies shall determine during the waste profile approval process whether existing data are likely to be representative of remediation wastes generated.	The development of DOE/ID-10960 gives the Agencies the opportunity to accept all waste streams.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
103	Sec 3.1, Box 7	3-1	The text states that verification sampling will consist of nonintrusive analysis such as a surface radiological survey. IDEQ agrees that the radiological survey and visual observation of the waste are essential components of verification. However, the use of only these techniques may not identify nonconforming constituents within the waste. For example, non-intrusive sampling will be of little value in verifying the presence and/or concentrations of heavy metals.  This comment was previously given in the IDEQ November 30, 2000 comments on the SSSTF 30 percent Remedial Design (comment 7) and the IDEQ May 25, 2001 comments on the ICDF 30 percent Remedial Design (Comment 125). If remedial investigation data is to be used to develop waste profiles in advance of excavation, then the verification step is extremely important, and must be of sufficient sensitivity to adequately characterize all wastes present. Please see comment #102 for additional comments on the	The development of DOE/ID-10960 addresses this issue.
104	Sec 3.1, Box 9 bullet	3-1	waste verification process.  Please describe how waste that does not match the profile will be set aside (i.e. where stored, how labeled, what time limits).	The waste not meeting the profile will be sent to the truck holding area inside the gate. Waste in the holding area will have a bar code that will indicate that the waste has not been accepted for disposition. Time frames are administrative, however, if the issue cannot be resolved within 48 hours, the waste will be moved to the staging area.
105	Sec 3.1, Figure 3-2, Boxes 4 and 5	3-3; also associated discussion on 3-4	See comment #123 regarding additional restrictions on waste that is eligible for discharge to the ICDF evaporation pond.	See response to comment 123.
106	Sec 3.3.1, Table 3-2, last item	3-7	The text references the ICDF Waste Placement Plan. Please identify, in the text, where this document can be found.	The ICDF Waste Placement plan was added to the reference list.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
107	Sec 3.4	3-8	<ul> <li>a) See comment #91 regarding reference to the DQO QA/QC plan.</li> <li>b) Please discuss how the referenced DQO's "will be included in the RD/RA work plans for those waste streams that are destined for the ICDF Complex for disposal." Some of those RD/RA Work Plans are already finalized. Please identify whether the ICDF staff will have responsibility to ensure that those primary documents and associated sampling plans are modified to incorporate this information.</li> </ul>	<ul> <li>a) See response to 91.</li> <li>b) It is not the responsibility of the ICDF management to review other WAGs' documents. If the waste stream is within the WAC limits it is acceptable for disposition in the ICDF Complex.</li> </ul>
108	Sec 3.5, 2 <sup>nd</sup> para	3-8	The text states "Testing will include the radiological screening results, and the results of these tests will be filed with copies of the waste profiles and all other supporting material for each waste." No mention is made of specific isotopic analysis results and/or analytical results for other non-radiological contaminants. All analytical results for the wastes should be included in the file. Please modify the text.	Text was changed to read "Testing will include the appropriate radiological and chemical screening results, and the results of these tests will be filed with the copies of the waste profiles and all other supporting material for each waste."
109	Sec 3.5, 4 <sup>th</sup> para, last sentence	3-8	Please insert "temporary" before the word "storage."	Temporary implies that the waste has a temporal limitation on the storage. For TRU waste greater than 10 nCi/g this might not be the case. The insertion of temporary would not be the case. Therefore, temporary will not be added to the text.
110	Sec 3.5.1	3-8	The text should indicate that the waste profile will be re-evaluated if it is found that the information on the waste profile (which was submitted months in advance of excavation) is not representative of the actual waste once excavation began. Unlike the instance described in bullet 2, this would be known prior to receipt of the waste at the ICDF.	The Waste Profile will be evaluated against the SWAF. Also the ICDF Complex waste generator personnel will verify the waste is within the profile. The container profile will be verified against the WP and any waste not meeting the WP will not be certified for entrance into the ICDF Complex. Language was added to the text to clarify this point.
111	Sec 3.6.1, 2 <sup>nd</sup> sentence	3-9	Replace the word "after" with "when".	Text was revised as stated.

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112	Sec 3.7,	3-9	a) See previous comment #103 regarding	a) See response to comment 103.
	Table 3-3		verification testing.	b) Text was clarified. This package inspection takes place at
			<b>b)</b> This table should include a column identifying	the waste generation site and, as such, should not be an
			what will be done if the results are "not	issue at the ICDF Complex.
			acceptable." These screening tools should be	c) Standard Operating Procedures (SOPs) will be developed
			used to determine whether there is a need to	for operation of the ICDF Complex. These SOPs will be
			collect samples for analytical (intrusive)	available to the Agencies "for information only". As
			testing to further validate the waste profile.	discussed during the November 13-14 face-to-face meeting,
			Guidance for this possibility needs to be	the O&M Plan will be updated to include the requirements
			included in this ICDF document.	for the SOPs.
			c) Written Standard Operating Procedures	d) Visual inspection has been added to the table.
			(SOPs) of the verification parameter	e) This section has been deleted. Weighing will be done at the
			techniques must be provided for IDEQ review	ICDF Complex rather than at the waste generation site.
			and included in this RD/RA WP. The IDEQ	f) This is a field screening issue for the package, not for the
			considers verification of the waste profile a	waste. It is a health and safety issue to ensure there are no
			critical component of the ICDF waste	gasses coming off the package that would require worker
			acceptance process. The ICDF complex must	safety issues.
			ensure that the same verification steps and	g) This information is not used for waste disposal, but
			techniques are the same and are consistently	transportation of the package to the ICDF Complex.
			applied across the INEEL CERCLA sites.	Therefore, the measurement accuracy is adequate for the
			d) "solids screen for free liquids" line item:	intended purpose.
			There is no entry under "Available Test	h) Contamination smears will be done in accordance with the
			Method" documenting how this screen will be achieved.	INEEL RadCon Manual.
			e) Weight line item: Acceptable results would	
			obviously depend on the weight of the waste	
			in question. For small quantities (e.g., a	
			5-gallon bucket), 100 lbs. may not be an	
			acceptable tolerance.	
		1	f) Organic vapor in headspace: The entry	
			under "Physical Form Applicable" is	
			incorrect. This verification test would apply	
			to volatile organic wastes, not inorganic waste	
			streams. Also, the entry under "Acceptable	
			Results" is inappropriate in that it provides no	
			basis that would trigger the need to collect a	
			sample for laboratory analysis should the	

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113	Sec 3.8.1	3-10	contaminants will be achieved.  Verification of containers at the SSSTF should include an inspection for free liquids resulting from transport, ALARA requirements notwithstanding.	Inspection will occur at the generator site and will be verified prior to shipment using ICDF waste generator personnel.
114	Sec 3.10	3-11	All records will be available for Agency review and are required to kept for at least 3 years.	As stated in the text, records will be handled as outlined in Section XX of the FFA/CO, the governing document.
115	Sec 4.1, 1 <sup>st</sup> para	4-1	Please define "RCRA past-practice" waste. This term should be added to the Nomenclature section once the Agencies have agreed to its definition in the context of wastes that may be eligible for disposal in the ICDF.	Text was clarified to define what RCRA waste might be acceptable.
116	Sec 4.1.1, Table 4-1	4-1 thru 4- 2	The table should identify for the reader the location (e.g., appendix #) where the referenced documents can be found.	All referenced documents shall be added to the References section of the WAC.
117	Sec 5.5, 1 <sup>st</sup> sentence	5-3	It is unclear why the qualification "as invoked by DOE Order 435.1" has been added to the reference of ARARs regarding RCRA and TSCA regulations (40 CFR 262, 761, and 763). Please explain the rationale for this qualification.	Text was clarified.
118	Sec 5.5.3, Table 5-5	5-5	No footnote "e" exists for this Table. (See TRU or mixed TRU waste).	Footnote e reference was deleted.

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119	Sec 5.5.8, 3 <sup>rd</sup> para	5-8	Please specify how bulk waste will be labeled and managed while in storage at the SSA or SSSTF.	Bulk waste will be labeled and managed the same as any other waste. It'll have the CERCLA waste label on it and any associated DOT, rad, etc., stickers. It'll be managed on the holding pad pending disposal in the landfill or treatment in the SSSTF.
120	Sec 6.1, Table 6-1	6-1	<ul> <li>a) Reference that this is a Phase I WAC plan should therefore include more prohibitive wastes that just the few listed in table 6-1. The more detailed list provided in the ICDF Landfill WAC should be included here.</li> <li>b) Clarify the rationale for limits of 6" size for materials to be treated. Clarify what the (for soil) means.</li> </ul>	<ul><li>a) This section is for the Treatment Unit only.</li><li>b) This is the specification for the unit.</li></ul>
121	Sec 6.4	6-2	Some reference should be made that container must be able to stand up to outdoor weather conditions. Cardboard boxes would not be an acceptable type container for long term storage.	Language was added that cardboard boxes are not acceptable.  There are no cardboard boxes listed in the acceptable container table.
122	Sec 6.6	6-3	It would seem appropriate that more specific dimensions be included on the concrete sizes that are acceptable. Unless tighter specifics are given, large unmanageable pieces of concrete will show up at the gate.	This is a handling issue. These requirements have been reviewed by the engineers and are deemed adequate.
123	App A, Item 2	A-10	The IDEQ disagrees with the assertion that any aqueous remediation waste from within the INEEL that meets the evaporation pond WAC can be accepted into the evaporation pond. As stated, the ROD specified that the evaporation pond will be designed and constructed to treat ICDF leachate and other aqueous wastes generated during operations of the ICDF complex. Decontamination water is an example of an aqueous waste that could be generated during operations of the ICDF complex, and could therefore go to the evaporation pond. The ROD also identified purge and pumping test waters from Group 5 as candidates for discharge to the evaporation pond. However, CERCLA aqueous wastes that are not generated as part of the	The ICDF Complex is being constructed to assist in CERCLA remediation activities at the INEEL. This Complex includes both the landfill and the evaporation pond. Wastes meeting the WAC for each unit are candidate wastes for disposition in the Complex. This issue was resolved during the November 13 and 14 meetings and resulted in the development of a process for acceptance of the waste streams as presented in DOE/ID-10960.

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		operation of the ICDF complex are not eligible for discharge to the evaporation pond. This includes as-generated wastes from process waste tanks and/or wastes generated as a result of implementing remedial actions on process waste tanks. These wastes are not eligible for discharge to the evaporation ponds, regardless of whether their contaminant concentrations meet the evaporation pond WAC.	
App A, Item 3	A-10	The referenced test states "there is no reason to sample to demonstrate that LDRs are being met. The Agencies continued request for this sampling does not have a regulatory basis. The sampling will only add cost to the remediation. One of the reasons for establishing CAMUs was to reduce cost."	DQOs have been developed for the evaporation pond and are included in ICDF 90% RD/RA work plan.  The intent is not to leave waste in the CAMU. Clean closure is the preferred option at this point, so discussion of waste left in place is premature.
		The IDEQ agrees that sampling of waste streams to the pond is not required to demonstrate compliance with LDRs. However, some sampling of leachate and other waste streams will be necessary to comply with the applicable CAMU requirements. Specifically, these requirements include 40 CFR 264.552 (c) (2) which specifies that "waste management activities associated with the CAMU shall not create unacceptable risks to humans or to the environment resulting from exposure to hazardous wastes or hazardous constituents" and 40 CFR 264.552 (c) (4) which states that "areas within the CAMU, where wastes remain in place after closure of the CAMU, shall be managed and contained so as to minimize releases, to the extent practicable." Therefore, wastes discharged to the evaporation pond must not pose an unacceptable risk to receptors via a windblown pathway, nor would discharge of wastes, which could be	
	APPENDIX  App A,	App A, A-10	operation of the ICDF complex are not eligible for discharge to the evaporation pond. This includes as-generated wastes from process waste tanks and/or wastes generated as a result of implementing remedial actions on process waste tanks. These wastes are not eligible for discharge to the evaporation ponds, regardless of whether their contaminant concentrations meet the evaporation pond WAC.  App A, Item 3  A-10  The referenced test states "there is no reason to sample to demonstrate that LDRs are being met. The Agencies continued request for this sampling does not have a regulatory basis. The sampling will only add cost to the remediation. One of the reasons for establishing CAMUs was to reduce cost."  The IDEQ agrees that sampling of waste streams to the pond is not required to demonstrate compliance with LDRs. However, some sampling of leachate and other waste streams will be necessary to comply with the applicable CAMU requirements. Specifically, these requirements include 40 CFR 264.552 (c) (2) which specifies that "waste management activities associated with the CAMU shall not create unacceptable risks to humans or to the environment resulting from exposure to hazardous wastes or hazardous constituents" and 40 CFR 264.552 (c) (4) which states that "areas within the CAMU, where wastes remain in place after closure of the CAMU, shall be managed and contained so as to minimize releases, to the extent practicable." Therefore, wastes discharged to the evaporation pond must not pose an unacceptable

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			Additionally, the pond must be managed in such a way as to minimize the potential of future releases. Sampling of the aqueous wastes discharged to the pond is necessary to comply with these regulatory requirements. The Agencies need to determine the analyte list and sampling frequencies needed to address this ARAR.	
125	Арр А	B-1 thru B-8	This appendix, which amounts to the USDOE's opinions/interpretations of a regulatory policy, is inappropriate and should be deleted from the remedial design. Section B-5, entitled "Issue Resolution," consists of the USDOE's opinions of issues on which the IDEQ has already provided regulatory determinations. There is no new information provided in this appendix which causes the IDEQ to change those determinations that have already been provided. However, for clarity, the IDEQ re-iterates its determinations on these issues in the following specific comments.	Comment noted, see associated responses.
126	App A, Items 1 and 2	B-6 thru B-7	The OU 3-13 Record of Decision states that within the AOC, LDRs apply only to soils from sites CPP-92, CPP-97, CPP-98, and CPP-99, or to soils that have triggered <i>placement</i> (OU 3-13 ROD, Table 12-3, Page 12-16). Consequently, any wastes that require treatment to meet the WAC prior to disposal in the ICDF are subject to LDRs (OU 3-13 ROD, page 12-21) since treatment will trigger placement. Placement is also triggered when the wastes are managed in such a manner as to constitute a RCRA storage unit as defined in 40 CFR 260.10, even if the storage unit is located within the AOC. The Staging and Storage Area is operated in accordance with the substantive requirements of IDAPA 58.01.05.006.01 and 58.01.05.006.02 (40 CFR 262.34 (a) (1); OU 3-13 ROD, Page vii). Therefore, placement will be triggered and LDRs must be met if hazardous wastes are eventually land disposed,	The DEQ comments state:  [A] Placement is also triggered when the wastes are managed in such a manner as to constitute a RCRA storage unit as defined in 40 CFR 260.10, even if the storage unit is located within the AOC. [B] The Staging and Storage Area is operated in accordance with the substantive requirements of IDAPA 58.01.05.006.01 and 58.01.05.006.02 (40 CFR 262.34 (a) (1); OU 3-13 ROD, Page vii). [C] Therefore, placement will be triggered and LDRs must be met if hazardous wastes are eventually land disposed, after they are removed from the SSA. [Letters have been assigned to each sentence for ease of reference.]  While sentence A may be true, B is not applicable, and therefore the conclusion C does not apply.

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			after they are removed from the SSA. The same is true regarding a temporary unit operated in accordance with 40 CFR 264.553 (USEPA, 1998, page 5). This was previously conveyed to the USDOE in the IDEQ's September 5, 2000 written comments on the draft SSA Waste Management Plan, the IDEQ's September 14, 2000 written comments on the draft Group 5 Monitoring System Installation Plan, and the IDEQ's November 30, 2000 written comments on the 30 Percent Design for the SSSTF.	The cited provision (sentence B) in the RCRA regulations states that "a generator may accumulate hazardous waste on-site for 90 days or less without a permit or without having interim status." It then states preconditions for waste management in order to qualify for that 90-day exemption from permitting. However, the DEQ commenters have failed to take into account the fact that the 90-day time limit is irrelevant to CERCLA response actions undertaken on the site, which by direction of 42 USC Section 9621(e)(1) (CERCLA Section 121(e)(1)) are fully exempt from all permit requirements, including (for example) RCRA and equivalent state laws and regulations.
			Reference Cited: USEPA, 1998, Management of Remediation Wastes under RCRA, Solid Waste and Emergency Response, EPA530-F-98-026.	There is no need for INEEL to invoke or qualify for the 40 CFR 262.34(a)(1) 90-day storage exemption from the normal RCRA storage unit permit requirements, because the underlying 40 CFR Part 264 and 265 permit requirement itself does NOT apply to this CERCLA activity. The only direct consequence of failing to comply with the specific provisions of 40 CFR 262.34(a)(1) which the DEQ commenters refer to as "substantive" is that an activity will not qualify for the 90-day exemption from permitting. But since the 90-day exemption is irrelevant to the CERCLA activities under consideration (by operation of law), the actions that would qualify someone for the 90-day exemption are also irrelevant and inapplicable to the CERCLA activities. The only consequence of not fulfilling the preconditions in 40 CFR 262.34(a)(1) is that one does not qualify for the 90-day exemption from permitting, but since this CERCLA activity does not need a 90-day exemption from permitting, a failure to qualify for the 90-day exemption has no effect on this CERCLA response action. In other words, there is NO legal requirement mandating that hazardous waste being managed at this location be managed as if it were in less-than-90-day accumulation units.
				The whole thrust of EPA's Area of Contamination policy is to allow hazardous waste excavated within an AOC to be managed

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				in a method that does NOT constitute RCRA storage, and to allow it to be redisposed within the AOC without constituting "placement" of hazardous waste that would otherwise trigger application of the LDR prerequisities for such disposal. Hazardous waste being managed within an AOC consistent with the EPA AOC policy does not need to be managed as if it were in a permitted storage facility. That is also true for hazardous waste within an AOC that is the subject of a CERCLA response action.
				EPA's Area of Contamination policy "allows wastes [such as in landfills] to be consolidated [an activity that would otherwise appear to be storage] or treated <i>in situ</i> within an AOC without triggering land disposal restrictions." And without triggering a requirement for a storage or treatment permit. The DEQ commenters' sentence C, quoted above, is clearly an out-of-context paraphrase of a section of the October 14, 1998 EPA OSWER memorandum on "Management of Remediation Waste Under RCRA," at page 8, under the subheading "Exemption for Ninety Day Accumulation." That paragraph discusses the fact that accumulation under the 90-day permit exemption (obviously) does not constitute land disposal (it is storage), but that "LDRs must be met if the hazardous wastes [that had in fact been managed as waste stored in a less than 90-day accumulation area] are eventually land disposed, for example, after they are removed from the accumulation unit." This discussion merely recognizes that storage allowed by RCRA does not constitute "placement" triggering LDR rules. It does NOT mean that ALL management of excavated hazardous wastes, prior to reinterment, constitutes storage, nor does it mean that hazardous waste excavated from a contaminated site
				must be placed into containers or managed as if it were in a storage TSD or less-than-90-day accumulation area. The DEQ commenters have assumed that this alternative to the general
				AOC rule somehow constitutes the entire AOC rule, and that optional management of waste as if in a storage area is

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				somehow mandatory, and they have thus misapplied the analysis outside its narrow factual predicate. As explained above, the mere fact that hazardous waste is within an Area of Contamination does not trigger the application of the 90-day storage rule, so there is no requirement that the waste be placed into a storage status, especially at a CERCLA response action site. So long as the waste is not in storage management mode, but has simply been excavated, its movement within the AOC does not constitute "placement" and does not trigger LDR standards.
				Therefore, the conclusion is that, while the DEQ commenter's sentence A is generally sound, sentence B is wholly incorrect, and therefore sentence C likewise does not apply to this CERCLA response action.
127	App A, Item 3	B-7	The IDEQ has determined that the time limits specified in 40 CFR 264.553 (d) and (e) are substantive requirements. Likewise, the time limits specified in 40 CFR 264.554 (d) and (h) for remediation waste staging piles are also substantive requirements. The IDEQ has determined that the time limits specified in these two regulations differ from those specified for the 90-day accumulation area. For the latter, 40 CFR 262.34 (b) clearly states that a generator who accumulates hazardous wastes for more than 90 days is subject to the permit requirements of 40 CFR 270. A CERCLA remedial action would not be subject to these administrative permit requirements. In contrast, there is no administrative provision to allow wastes to remain in a temporary unit beyond one year (with a potential single extension of up to one year), or in a remediation waste staging pile beyond two years (with a potential single extension of up to 180 days). The one-time extensions for these units are granted at the discretion of the regulatory agencies,	(1) IDEQ claims to have "determined" that certain provisions of the RCRA regulations are "substantive," presumably so that they are not barred by the ban on "procedural" requirements in 42 USC §9621(e)(1), CERCLA §121(e)(1), echoed at 40 CFR §300.400(e)(1), and which is incorporated explicitly into the INEEL FFA/CO at Paragraph 7.7. The legal authority to implement CERCLA §121 was delegated by the President, via Executive Order 12580, to the Department of Energy (see §2(d)). This is recognized by the National Contingency Plan at 40 CFR §300.5 (DOE is CERCLA "lead agency"), §300.120(c)(1), (f)(2) (DOE appoints Remedial Project Manager at its facilities), 40 CFR §300.175(b)(5) (DOE is responsible for "taking all response actions" on DOE facilities). State agency participation in the process in accordance with CERCLA §121 (the nomination of ARARs) is provided for under CERCLA §120(f), but it is clear that the States do not in themselves have authority to administer CERCLA. Thus, IDEQ can properly nominate a specific provision of the RCRA regulations as an ARAR standard to be applied mandatorily in the selection and implementation of the remedial action, but IDEQ does not have authority to
			days). The one-time extensions for these units are	applied mandatorily in the selection and implementation of

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			units) and 40 CFR 264.554 (I) (remediation waste staging piles.) Hence, the IDEQ has determined these time frames to be substantive requirements, which are applicable to CERCLA remedial actions. This determination has been verbally conveyed to the USDOE by IDEQ during comment resolution of the SSA Waste Management Plan and the 30 percent SSSTF Remedial Design.	"substantive" versus "procedural" or which are either "Applicable" or "Relevant and Appropriate." Under the FFA/CO, Paragraph 8.15, DOE has agreed to provide both EPA and IDEQ a full opportunity to nominate such ARARs, and to take disagreements over the DOE selection of ARARs into the formal dispute resolution process. Both DOE and IDEQ have agreed to abide by this method of decision-making in case of disagreement.
				(2) IDEQ asserts that the time limits set out in 40 CFR §264.553(d),(e) and §264.554(d), (h) are "substantive requirements." IDEQ acknowledges that a CERCLA remedial action that involves storage for more than 90 days is not subject to the usual RCRA requirement for a storage unit permit, but attributes this to the fact that a permit might be obtained for storage periods longer than 90 days; in other words, IDEQ has a theory that a CERCLA remedial action can only be conducted within the boundaries of a potential permit. IDEQ therefore claims that because there is "no administrative provision to allow wastes to remain in a temporary unit" or "remediation waste staging pile" longer than the times allowed in the RCRA regulations, then a CERCLA remedial action is likewise limited by the parameters of a potential RCRA permit for such actions.  However, the CERCLA Compliance With Other Laws Manual states at section 2.3.3 that "Administrative RCRA requirements, such as reporting and recordkeeping requirements, are not applicable or relevant and appropriate for on-site activities." Similarly, the EPA RCRA, Superfund & EPCRA Hotline Training Module on ARARs (EPA540-R-98-020, February 1998) explains that "For on-site response activities, CERCLA does not require compliance with administrative requirements, such as permits, reports and records, apply
				only to hazardous substances sent off site for further management."(page 3) "The [CERCLA §121(e)] permit exemption allows the response action to proceed in an expeditious manner, free from potentially lengthy delays

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				associated with the permitting process," (page 7) as well as from
				the arbitrary time limits that might be contained in regulations
				under other laws. "EPA interprets CERCLA §121(e) broadly to
				cover all administrative provisions from other laws, such as
				recordkeeping, consultation, and reporting requirements
				while the RCRA requirement to obtain a permit would not
				be an ARAR." (page 7)
				IDEQ's theory, that CERCLA remedial actions must stay
				within the limits of all potential permits, does not have any basis
				in CERCLA or the NCP, nor do they cite any authority for this
				rather original interpretation. IDEQ admits that extensions of
				the regulatory time limits "are granted at the discretion of the
				regulatory agencies." The time limits are therefore not objective
				standards, but instead are discretionary <u>administrative</u>
				requirements that cannot function as ARAR standards. The
				time limits in the cited provisions function solely for the
				purpose of limiting the <u>discretion</u> of the regulatory agency
				administering RCRA in how long it can grant a permit. Because
				no permit is required for a CERCLA remedial action, per
				CERCLA §121(e)(1), the CERCLA Remedial Project Manager
				does not need "permission" from any other entity to manage a
				temporary unit or a remediation waste staging pile (as distinct
				from the consensus process of agreement under the FFA/CO).
				The time limits on such "permission" are therefore irrelevant.
				(2) Everthormore if we as healt to the healt requirement to
				(3) Furthermore, if we go back to the basic requirement to consider ARARs in the planning of remedial actions, CERCLA
	İ			§121(d)(2) calls for the remedial action to follow a "standard,
				requirement, criteria or limitation" that is either legally applicable or relevant and appropriate only "With respect to any
		1		hazardous substance, pollutant or contaminant that will remain
				onsite" after the remedial action is completed. There is no
				statutory mandate to apply any non-CERCLA requirements if
				the activity concerned does not relate directly to determining
				how much hazardous substance will be left in the ground at the
				conclusion of the remedial action. Unless there is some
				l l
	<u></u>	<u> </u>		permanent impact from the CERCLA remedial activity upon the

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				site, requirements that might have regulated such an activity outside the CERCLA context, do not apply in any way. Therefore, intermediate stages of the CERCLA remedial process are not generally governed by ARARs, except to the extent that the specific process directly affects the amount of residual contamination at the site. Thus, removal actions are not mandated to meet ARARs standards upon their completion, since they are often only intermediate steps to be followed by additional remedial actions that will determine the final levels of contaminants onsite. The time limits under RCRA for temporary unit permits and waste staging pile authority do not affect such residual contamination, and therefore are not ARARs, and do not govern the activity under consideration.
128	App A, Item 3	B-7	The Area of Contamination (AOC) concept is a regulatory policy developed to facilitate remediation. As such, an AOC is typically determined after the extent of contamination is known and a remedial alternative is selected. The Agencies have selected an AOC for operable unit 3-13, but have not done so for operable unit 3-14, which is in the remedial investigation phase. The fact that the tank farm and the groundwater within the INTEC fence were once a part of operable unit 3-13, does not foreordain that the OU 3-13 AOC will be applied to the OU 3-14 sites. The OU 3-13 AOC boundary was largely defined by wind-blown contamination from site CPP-95. The extent of the CPP-95 wind-blown contamination does not apply to the OU 3-14 sites. Finally, the statement that the designation of an AOC "is clearly left as a matter of discretion to the designated RPM, which for the INEEL is the representative of the Department of Energy "is inaccurate. The responsibility to ensure the proper application of this regulatory policy lies with	(1) The DEQ comment asserts that "the responsibility to ensure the proper application of this regulatory policy lies with the regulatory agencies, not the regulated party." DEQ commenters should review the authorities under the CERCLA statute which have been delegated by Executive Order 12580 from the President to the Department of Energy (cited above), which is the same source of authority by which EPA conducts CERCLA response actions. This authority is recognized by EPA in the National Contingency Plan (cited above) as well as in the INEEL FFA/CO. When it comes to enforcing CERCLA and CERCLA policy, DOE is the primary implementing agency, with EPA given an oversight role by CERCLA §120, and the States given a cooperative role within that context. The Area of Contamination (AOC) policy is a creature of the National Contingency Plan (see preambles to the proposed NCP at 53 FR 51444 and the final NCP at 55 FR 8758-8760), and does not appear in the RCRA regulations, but rather interprets RCRA regulations in a manner that facilitates CERCLA response actions. Thus, the application of the AOC policy is primarily the responsibility of the federal agencies exercising CERCLA authority at INEEL.  (2) The definition of an Area of Contamination is discussed in the preamble to the NCP issued March 8, 1990 (55

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ITEM	FIGURE/	PAGE	the regulatory agencies, not the regulated party.  However, the OU 3-13 ROD and subsequent post-ROD design documents allow for investigation-derived wastes from OU 3-14 to be managed in accordance with the OU 3-13 remedy utilizing the SSSTF and The ICDF. Investigation-derived wastes from OU 3-14 may be sent to the SSA for eventual treatment (if necessary) and disposal in the ICDF (if it meets the ICDF WAC).  This was previously conveyed to the USDOE in the IDEQ's September 22, 2000 written comments on the draft final Remedial Investigation/Feasibility Study work plan for OU 3-14.	FR 8758), which states that the proposed rule  equated an area of contamination (AOC), consisting of continuous contamination of varying amounts and types at a CERCLA site, to a single RCRA land disposal unit, and stated that movement within the unit does not constitute placement. It also stated that placement occurs when waste is redeposited after treatment in a separate unit (e.g., incinerator or tank), or when waste is moved from one AOC to another. Placement does not occur when waste is consolidated within an AOC, when it is treated in situ, or when it is left in place.  There is no indication in this official statement that the AOC is to be "determined after a remedial alternative is selected," as was asserted in the DEQ comment. Rather, the AOC policy is especially useful during remedial investigations and removal actions, before a final remedy has been determined, because it can facilitate those actions without having to comply with LDRs. There is also no requirement that an AOC be tied to a specific operable unit, because the sole defining element of an AOC is that there be an area of "continuous contamination at a CERCLA site." Once the fact of such an area of contamination is determined to exist, it operates to exempt intra-area movement of wastes from triggering LDRs, and does not have to be formally incorporated into each and every individual operable unit affecting contamination within the AOC. The
				to be formally incorporated into each and every individual operable unit affecting contamination within the AOC. The
				NCP defines an "operable unit" as "an incremental step" or a "discrete portion of a remedial response" which may divide up, not the site, but the overall remedial action at a site, into logical
				subdivisions on the basis of chronological order, type of contamination, or particular geographical boundaries. (40 CFR §300.5) The operable unit is intended to be a flexible tool for
				facilitating remedial action, and is <u>not</u> intended to be a jurisdictional entity, like a permit, that requires the remedial
				project manager to surmount a fresh set of legal hurdles for each

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
	APPENDIX			OU. There is simply no requirement under CERCLA law or the NCP that an AOC be tied to a particular operable unit. And that was not done here.
				(3) The assertion in the DEQ comment that "The Agencies have selected an AOC for operable unit 3-13, but have not done so for operable unit 3-14" is incorrect. The relevant AOC was defined in the Final ROD (agreed to by DEQ and EPA) for OU 3-13, at Section 11.1, page 11-13, which states
				For the purpose of selecting final surface soil remedial actions, the <u>WAG 3 AOC</u> (consisting of <u>an area extending across all contaminated soils at WAG 3</u> , as shown in Figure 1-10) will be considered a CERCLA AOC. The AOC allows for the flexibility in moving and staging noncontiguous soils while implementing selected remedial alternatives.
				While Figure 1-10 is labeled "OU 3-13 area of contamination (CPP-95)," the text of the ROD consistently refers to the "WAG 3 AOC," so this AOC applies to "all contaminated soils," and thus all operable units, within WAG 3. The following pages and sections are representative:
				The ICDF will be located within the <u>WAG 3 area of</u> contamination (AOC). [Page vi.]
				The ICDF operation will: 5. Treat waste (soils, debris and treatment residues) originating from outside the WAG 3 AOC to comply with the land disposal requirements. [Section 8.1.3.1, page 8-8.]
				The majority of soils excavated from WAG 3 for disposal at the ICDF will not be subject to Land Disposal Restrictions, since they will be placed directly in the ICDF because WAG 3 is considered one single AOC for purposes of disposal at the ICDF If

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				wastes are received from areas outside the WAG 3  AOC for disposal at the ICDF, they will be required to meet the ICDF waste acceptance criteria and LDRs.  [Section 12.2.3.1, page 12-21.]
				[Concerning the SFE-20 Hot Waste Tank] Since the tank system components and other wastes occur within the WAG 3 AOC and are considered remediation waste, they can be disposed in the ICDF without triggering LDRs or MTRs. [Section 12.2.7.1, page 12-33]
				(4) The DEQ comment argues that the waste being addressed through OU 3-14 is somehow distinct from the waste covered by OU 3-13, and therefore is separate from the AOC that encompasses OU 3-13. However, since both OU 3-13 and OU 3-14 address waste that is a subset of the waste being addressed by Waste Area Group 3, and since the AOC has been designated by agreement of DOE, EPA and the State as the AOC for WAG 3, the same AOC applies for OU 3-14. Furthermore, actual examination of the OU 3-13 ROD clarifies that OU 3-14 is actually a final remedial action for the same contaminants that are being actively remediated as interim remedial actions under OU 3-13. (See, for example, the discussion of the relationship between OU 3-13 and OU 3-14 in the OU 3-13 ROD at pages iv, ix, xi, 4-9, and 5-9.) Thus, the contaminants being addressed in OU 3-14 are a subset of the contaminants included within the AOC that encompasses
				OU 3-13.  In fact, the DEQ comment partly acknowledges this close relationship when it observes that "the OU 3-13 ROD allow[s] for investigation-derived wastes [IDW] from OU 3-14 to be managed in accordance with the OU 3-13 remedy utilizing the ICDF." The specific statements on OU 3-14 IDW in the ROD make it clear that this is simply in recognition that OU 3-

ITEM	SECTION/	PAGE	COMMENT	RESOLUTION
	FIGURE/ APPENDIX			
				14 waste is a subset of the OU 3-13 waste and within the same AOC:
				Legacy waste that was generated as a result of previous sampling activities under WAG 3 RI/FS [i.e., investigation derived waste (IDW)] and removal actions will be disposed in the ICDF. Wastes from OU 3-13 RD/RA activities and IDW will be temporarily managed within the WAG 3 AOC By managing the wastes in the AOC, placement will not be triggered. [Section 11.1, page 11-13]
				Investigation derived waste (IDW) from OU 3-13 RD/RA activities and OU 3-14 investigations, including soil cuttings, well purge water, personnel [sic] protective equipment, decontamination water, and similar wastes generated during sampling and inspection/maintenance activities will be temporarily managed (not to exceed 1 year) in a staging area By managing the wastes in this area [of contamination], placement will not be triggered. [This is the definition and purpose of an AOC.] The final disposition of these wastes will be in the ICDF. [Section 12.2, page 12-9]
				OU 3-13 RD/RA and OU 3-14 monitoring well construction and sampling wastes generated prior to the construction of the ICDF and SSST will be managed and treated with the WAG 3 AOC in remediation waste staging piles and temporary units The final disposition of these wastes will be in the ICDF. The anticipated wastes include soil drill cuttings, monitoring well purge water, personnel [sic] protective equipment, and decontamination wastes. [Section 12.2.5.1, page 12-29]
				These passages also demonstrate, contrary to the DEQ

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
				comment's assertion, that an AOC is just as important to pre- ROD remedial investigation as it is to post-ROD remedial action.
				(5) In summary, all remedial activities involving movement of contamination that is the subject of OU 3-14 are entitled to take advantage of the designation of the Area of Contamination for all of Waste Area Group 3.

DOCUMENT TITLE: Draft RD/RA Work Plan for the SSSTF, Appendix K, Operations and Maintenance Plan, DOE/ID-10859

Plan	<u>, DOE/ID-1</u>	10859		· · · · · · · · · · · · · · · · · · ·
ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
129	Sec 2, 2 <sup>nd</sup> para, 2 <sup>nd</sup> sentence	2-1	Please see Comment #126 regarding when placement is triggered within the AOC.	No change to text.
130	Sec 2, 2 <sup>nd</sup> para, 6 <sup>th</sup> sentence	2-1	Please see comment #123 regarding restrictions on the types of wastes discharged to the evaporation pond.	No change to text.
131	Sec 3, 4 <sup>th</sup> para, 1 <sup>st</sup> sentence	3-1	This sentence states: "All operational work at the SSSTF will be covered by technical procedures (TPRs), which will be located in the Operations and Maintenance Manual that will be available during start-up/pre-final inspection of the SSSTF for Review." This proposed approach does not provide for meaningful Agency review of these written procedures, and is therefore insufficient. This document comprises the remedial action work plan required under CERCLA. As such this document must include the procedures necessary to implement the remedy. The Technical Procedures are subject to Agency review, especially those relating to environmental protection such as mitigation of airborne dusts and operational tasks associated with waste treatment, decontamination of equipment, and/or sampling. Provide copies of these procedures for Agency review.	Levels of O&M information develop as implementation of the construction progresses. Procedures will be made available to the Agencies prior to or during pre-final inspection. No change to text.
132	Sec 3.1, 2 <sup>nd</sup> para, 2 <sup>nd</sup> sentence	3-5	a) General: This discussion is too vague to be meaningful. Waste characterization is an extremely important component of this remedial action, and will involve the Agency concurrence (see comment # ).  [NOTE: Original IDEQ Comment 132 a) employed the "Engrave" effect for the information following the word "concurrence". The reason for using this effect is unclear. Ed.]  b) Second Sentence: It is unknown what is meant by	A new document, DOE/ID-10906, "ICDF Complex Approved Waste Streams," has been included to address this issue. No change to text.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
			the "ICDF Waste Protocol" that outlines the data requirements for the data quality to be used on the waste profile. Please clarify and document in the text.  c) Third Sentence: The text states that the LDR status of will be determined during the planning stages and designated prior to shipping. Existing remedial investigation data used for remedy selection may not be representative of hazardous wastes encountered once excavation occurs. This is especially true for sites at which the area of suspected greatest contamination was inaccessible for sampling due to buried pipes/utilities and/or structures, or for sites at which there were no surface indications of hotspots. Therefore, there must be verification, with sufficient sensitivity, to determine if further TCLP samples are needed to verify whether characteristic levels are exceeded in the excavated materials. The types of testing and verification sampling results that would trigger further TCLP testing must be concurred with by the Agencies, and included in this document.  d) Fifth Sentence: This sentence states that "when a waste designation is based solely on process knowledge, the generator will ensure that the chemical, physical, and radiological properties of the waste are adequately determined." Please specify how this will be done.	
133	Sec 3.1, 3 <sup>rd</sup> para, last sentence	3-5	Note: No "field" currently exists on the Waste Profile form to enter this information.	No change required. See Part II box 7 of the proposed profile format.
134	Sec 3.2	3-6	The Waste Receipt process flow (and Section 3.2 text) should be modified to address all vehicle and container tare weights. Please add text (and boxes on flow charts) that describes and records this activity.	Comment accepted. Box 3-1a "Weight Scale" added to Figure 3-3. Descriptive text for box C-1a, "The waste load is weighed. Tare weights will be recorded for trucks and, if necessary, reverified. Tare weights of containers will be based on electronic tracking system information."
135	Sec 3, Figure 3-3	3-7	The box for "Sign/ approve shipping documents" does not have a label (C-8).	Comment accepted. Box C-8 on Figure 3-3 was enlarged to show the label.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
136	Sec 3.4, 1 <sup>st</sup> para, 4 <sup>th</sup> sentence	3-11	Please describe how wastes will be managed until sampling results are verified at the ICDF Complex, including labeling, segregation, weather protection, and storage time limits.	Added sentence after fourth sentence: "All treated waste will be placed in a separate designated area pending analyses. These wastes will be staged and segregated from all other wastes until such time that data results are verified."
137	Sec 3.4, 1 <sup>st</sup> para, 5 <sup>th</sup> sentence	3-11	The need for a Treatability Study should be known, and the study conducted earlier. To avoid overtaxing the SSSTF (and the limited staging/storage area provided) the Treatability Study is best performed well in advance of actual receipt of the waste.	Comment noted and agree. No change to text.
138	Sec 3.4, 3 <sup>rd</sup> para, 3 <sup>rd</sup> sentence	3-11	The text states that aqueous waste will be used as the water in the stabilization process. Unless this aqueous waste has been used in the development of the mix design, please discuss what confirmation exists that this liquid does, or does not, affect the mix design.	Comment noted, the use of aqueous waste may be included as necessary in any treatability studies for the waste streams prior to treatment. Added text to clarify, "if a previous treatability has demonstrated that using the aqueous waste does not adversely impact the resultant product."
139	Sec 3.4, Box D-1	3-14	Please describe how wastes will be managed during staging or storage at the ICDF Complex, including labeling, segregation, weather protection, and storage time limits.	Text added to box D-1 description, "The wastes will be placed in a separate designated area pending analyses. These wastes will be staged and segregated from all other wastes until such time that the data results are verified."
140	Sec 3.4, Box D-7	3-14	<ul> <li>a) This states that liquids will be transferred to the ICDF Complex liquid storage tanks, where will this transfer take place at the SSSTF facility. What provisions are provided for spill containment.</li> <li>b) Review of the SSSTF document has not revealed the location or specification of "the ICDF Complex liquid waste storage tank". Please provide information related to this feature.</li> </ul>	Comment noted, added text to identify the use of current SSA tankage and spill prevention procedures. "This is the existing Staging Storage Annex (SSA) (figure 2-1) inside the INTEC perimeter fence," sentence added to Box D-7 description.  The following sentence was also added to the end of the second paragraph of section 1, "When the SSA is transferred to SSSTF, all procedures, plans, and other documentation will be included."
141	Sec 3.4, para 1	3-16	Some type of time limit must be included to hold a truck while pending resolution. Since it is nonconforming waste, if it is held for more than 8 hours, it should be put in a proper contained storage location.	The SSSTF includes a truck holding area to allow for temporary holding of waste that is not accepted at the gate. A procedure for the movement of waste from this area will be developed in the O&M Manual. Holding times are administrative requirements and are not limiting factors. No change to text.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
142	Sec 3.5, para near bottom of page	3-20	<ul> <li>a) Clarify the process for assuring decontamination of all vehicles leaving the landfill do not track out waste and contamination as they go to the scale.</li> <li>b) Clarify that all waste vehicles that have dropped off waste are weighed prior to leaving the site. This section indicates that a truck may not be weighed.</li> </ul>	<ul> <li>a) All areas except the landfill will be clean and no contaminated vehicles will be allowed to leave the landfill until contamination is controlled for transport to the Decon facility for further decontamination. Text changed to read, " near the workface. Should the truck not meet the free-release criteria, it will be decontaminated and resurveyed at that location. If the work face decontamination techniques are not successful, then the contamination will be contained and the truck will be taken to the decontamination facility"</li> <li>b) Empty tare weights are not expected to change and are considered to be acceptable accuracy for waste tracking purposes. No change to text.</li> </ul>
143	Sec 4	4-1	The text indicates that the remedial action will use PLN-114, the "INEEL Emergency Plan RCRA Contingency Plan. Note that the IDEQ must be notified in accordance with 40 CFR 264.56 whenever this plan is implemented.	Comment noted. No change to text.
144	Sec 5, 3 <sup>rd</sup> para, last sentence	5-1	Please add to " of operation and tightness to ensure differential (negative) pressure optimization of HEPA filtration system".	Comment noted, but the following paragraph adequately covers the issue of HEPA system maintenance. No change to text.
145	Sec 5, 4 <sup>th</sup> para	5-1	If there is the potential for the relative humidity of the off- gas to exceed 90 percent, the humidity of the off-gas stream (up stream of the HEPA filter) should be monitored. If the humidity exceeds 90 percent, an efficiency test must be completed, and/or filters replaced before operations continue.	See resolution to comment #72.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
146	Sec 5, last para on page	5-1	<ul> <li>a) Container storage areas must be inspected weekly in accordance with 40 CFR 264.174 and any tank systems must be inspected daily in accordance with 40 CFR 264.195 (b).</li> <li>b) Inspection checklists need to be developed, reviewed and concurred with by the Agencies, and included as an attachment to this plan. We suggest that the inspection checklist that has already been developed and included in the SSA Waste Management Plan be modified and incorporated for this purpose.</li> </ul>	<ul> <li>a) Sentence added as follows: "Container storage areas will be inspected at least weekly to identify any possible leaking or deterioration of containers. In addition, any tank systems will be inspected on a daily basis to identify corrosion or releases of waste and to ensure the tank system is being operated according to its design. The construction materials and area immediately surrounding the externally accessible portion of the tank system will be inspected daily to detect erosion or signs of releases of hazardous waste."</li> <li>b) Will update SSA WMP weekly and daily inspection checklists and provide as an Appendix A and B to the O&amp;M Manual.</li> </ul>
147	Sec 5,	5-2	If the scale is out of service, please describe the	Comment accepted. Added text, "Should the scale be out for
	1 <sup>st</sup> para		contingency procedures that will be employed to weigh	service, trucks will either be weighed on a certified portable
			vehicles/containers in and out of the facility.	scale or routed to the certified scale at CFA."
148	Sec 5, 2 <sup>nd</sup> para	5-2	Clarify how the maintenance work will be done on the heavy equipment and support vehicles used in the landfill. For example what if a transmission has to be replaced, hydraulic hoses, routine oil/filter changes.  Where on the ICDF facility would the repairs be done and what steps will be taken to decontaminate a piece of	Comment noted; ICDF RD/RA WP will cover the issued of maintenance needs for contaminated equipment from the landfill. No change to text.
			equipment for service.	
149	Sec 10.2, 1 <sup>st</sup> bullet	10-1	This bullet is confusing. Please explain what this means.	Comment accepted, added text to clarify, "(i.e. personnel authorizing a given shipment).".
150	Sec 10.4, 1 <sup>st</sup> bullet	10-2	Please modify the passage to read, "storage, disposal, or shipment from the facility."	Comment accepted, text revised as suggested.
151	Арр А	Genera 1	The data requirements in this appendix are undefined. The Appendix contains generalities rather than specifics. The lack of specific data requirements makes this document unenforceable and of little value. The Agencies will approve all waste profiles for acceptance in the ICDF complex.	Appendix A was deleted will be included in the WAC with revisions.
152	Арр А	1	a) The text states that representative sampling is not to be concentrated in either the "hot" or "cold" spots. Yet the data evaluation will include samples that are	Appendix A was deleted and will be included in the WAC with revisions.

ITEM	SECTION/	PAGE	COMMENT	RESOLUTION
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			non-detect yet assigned concentrations of the detection limit or area background whichever is higher. Please identify when it is appropriate for the "background" concentration of a contaminant to exceed the analytical method detection limit.  b) If non-detects are incorporated into the "conservative mean" calculation, then samples from known "hot spots" must also be included in the mean to ensure conservatism.	
			c) A minimum number for the statistical parameter <i>n</i> must be defined. Biasing samples away from the hot and cold spots could result in an underestimate or overestimate of the actual mean. How does a generator determine the number of samples to collect for the tier 1 sampling?	
153	Арр В	B-4	<ul> <li>a) Specification should include some reference to temperature limits for use of grouting material. Comments should include location for curing of grout to ensure area at acceptable temperature to properly cure grout.</li> <li>b) Comments that no free or standing liquids will be allowed after the box is filled should be included. If the grout mix is too watery, excess water could be</li> </ul>	<ul> <li>a) Temperature shall be between 50 and 100 degrees F for the required curing period.</li> <li>b) The top cover of the box shall be ventilated to allow the evaporation of bleed water.</li> <li>c) Vibration is recommended but not necessarily required if the grout is fluid enough.</li> <li>The text will be modified to incorporate this comment.</li> </ul>
			left on top of the material.  c) Vibration should be incorporated in filling of all boxes and containers not just tanks.	The text will be mounted to meorporate this comment.

DOCUMENT TITLE: Draft RD/RA Work Plan for the SSSTF, Appendix M, ICDF Complex Operations Waste Management Plan. DOE/ID-10886

Wasi	te Managei	ment Pi	an, DOE/ID-10886	
ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
154	Sec 3.1, last sentence under section heading	3-1	Please see Comment #126 regarding when placement is triggered within the AOC.	Resolution is the same as Comment 126 resolution, which is no change to this document.
155	Sec 3.2, Table 3-1	3-3	The disposition pathway for excess dust suppressant will depend on the type of suppressant used. See comment #123 regarding the restrictions on wastes that may be discharged to the evaporation pond.	Table 3-1 was updated. Excess dust suppression was changed from "ICDF EP" to "INEEL material exchange." The appropriate WAC was changed from "ICDF EP WAC" to "RRWAC."
156	Sec 4.1, last sentence	4-1	See comment #124 regarding characterization requirements for wastes discharged to the CAMU unit.	Pond sampling will be addressed prior to final inspection. No change to this document.
157	Sec 5.3.1, 1 <sup>st</sup> sentence	5-2	Replace "should" with "shall" in this sentence.	"Should" was deleted from Sec 5.3.1, first sentence and "shall" was inserted
158	Sec 4.4 [sic, Sec 5.4? Ed.]	5-2 thru 5-3	Copies of the actual inspection checklists to be used for this remedial action should be provided for Agency review and concurrence, and included as an attachment to this plan.	The SSA checklist was modified to be a weekly container checklist. A daily tank inspection checklist was developed. Both checklists are new appendices to the O&M plan (Appendix K) as per response to #146, b.
159	Sec 5.5	5-3	The text indicates that the remedial action will use PLN-114, the "INEEL Emergency Plan RCRA Contingency Plan. Note that the IDEQ must be notified in accordance with 40 CFR 264.56 whenever this plan is implemented.	No Action. Comment noted.
160	Sub-App B		This table should be checked against waste management ARARs found in Table 12-3 of the OU 3-13 Record of Decision. Several ARARs associated with waste management that were identified in the ROD, are missing from this table (e.g., 40 CFR 264.1082 through 1088, PCB regulations).	Tables were compared. 40 CFR 264 Subpart J was added to WMP Table B-1. 40 CFR 264.1082 through 1088 are not applicable. PCB regulation 40 CFR 761.79(a) and (b) are in the O&M plan ARARs.

DOCUMENT TITLE: Draft RD/RA Work Plan for the 90% SSSTF; Volume 2; Appendix Q – Treatability Study Test Plan for Soil Stabilization at the SSSTF (DOE/ID-10903)

Stua	y rest Pian	1 10r 501	il Stabilization at the SSSTF (DOE/ID-109	903)
ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
161	Sec 1.3, Table 1-1	1-3	Site CFA-04 lists "rocky soil" as a component. Please describe how the full-scale soil stabilization system will be able to handle this type of waste stream without the ability to size reduce the oversize components.	No change to the document. See Response to Comment #37a.
162	Sec 1.5, last sentence	1-3	The cure time is mentioned in this paragraph as not being examined in the treatability studies and it is stated that the full-scale design will be based on "a relatively short cure time of 24 hours for the Portland cement system." Please describe the source of this assumption since ambient temperatures will influence the cure times for Portland cement-based stabilization treatment. In addition, cure times will also depend upon the degree of homogeneity of the mix: the more intimate the waste to reagent blend interface, the faster (and more thorough) the treatment cure result.	Text was clarified to state that stabilization is expected to occur quickly (<24 hrs). Curing will take place at somewhat controlled temperatures inside the decontamination building and the efficient mixing system will reduce the need for longer cure times. Additionally the cure time of the treated waste will always be similar to or longer than the cure time of the treatability sample.
163	Sec 2, 4 <sup>th</sup> para, 3 <sup>rd</sup> sentence	2-1	The sentence, as written, should be modified to indicate the treated waste will be moved from the treatment facility to the landfill after verification of the waste meeting the LDR treatment standards and ICDF Landfill WAC.	The text was clarified to read: ",,,directly into the landfill following verification that the treated waste meets the ICDF landfill WAC."
164	Sec 3.1	3-1	Clarify that one of the objectives in to ensure that a dilution effect from large quantities of reagents is not the reason that the TCLP test proves successful. At some point, the amount of waste treated to the amount of reagents must not result in a straight dilution of the metals and not a chemical treatment.	Text was clarified to indicate that dilution effect will not be what is ensuring the waste meets the disposal requirements. A nonlinear drop in concentrations vs. waste loading would indicate stabilization is effective.

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
165	Sec 3.3.7, para 3, 3 <sup>rd</sup> sentence	3-8	<ul> <li>a) Clarify what is meant by the sample will be cured before running the TCLP. Note any time allowed for curing prior to running the TCLP will have to be incorporated in the operations plan.</li> <li>b) Also clarify when the sample of the 'cured' material will be taken.</li> <li>c) Identify whether the sample to be run for the TCLP will be taken after curing or whether the sample will be collected and then cured.</li> </ul>	<ul> <li>a) The text was clarified to state that the cure time will be less than 24 hours. And that it is important that the cure time for the treatability sample be similar or less than that of the operational procedures.</li> <li>b) No change to the document. It does not matter whether the sample is taken prior to or after curing since curing will continue in the sample until the extraction process begins.</li> <li>c) See response to comment #165.</li> </ul>
166	Sec 4.2, 1 <sup>st</sup> para, 1 <sup>st</sup> sentence	4-1	There appears to be a word missing after 'The stabilization,please clarify what is meant here.	Text was clarified to read, "The stabilization reagents will be"
167	Sec 4.2, 1 <sup>st</sup> para, last sentence	4-2	<ul> <li>a) Reference is made to the generation of Hydrogen Sulfide gas, clarify in the operational plan and the design for the treatment room in the Decontamination building, where the potential danger of hydrogen sulfide gas is addressed.</li> <li>b) In addition, clarify whether reagents and waste will be added at the same time in the actual plant treatment process. There was considerable discussion on minimizing dust generation, and it would appear that adding both together with no water would be generate significant dust.</li> </ul>	<ul> <li>a) No change to the document. Generation of sulfide gas is to be avoided. The treatment unit has an independent negative pressure HVAC system and any generated gas will be monitored and filtered as necessary. The HASP and/or other safety documentation will address these concerns.</li> <li>b) No change to the document. Operating procedures for the treatment equipment will be provided in the O&amp;M procedures.</li> </ul>
168	Sec 5	5-1	Clarify that the full TCLP metal scan will be conducted and reported and not just the suspected metal of concern.	The text was revised to state, "All samples will be analyzed for contaminants of concern, potential contaminants of concern (TCLP), and free liquids (PFT)".  It is not necessary to run TCLP for chromium if no chromium is associated with the stream. Suspected underlying constituents will also be tested (i.e., PCOCs).
169	App A, Sec A-5	A-4	A statement should be include to evaluate the quantity of additives used to verify that the results achieved were not a result of dilution of the waste with a large amount of reagents.	See Response to Comment #164.

DOCUMENT TITLE: Draft RD/RA Work Plan for the SSSTF, Appendix R, Draft Sampling and Analysis Plan for SSSTF Waste Stabilization Operations WAG 3, OU 3-13, DOE/ID-10924

ITEM	SECTION/ FIGURE/ APPENDIX	PAGE	COMMENT	RESOLUTION
170	Sec 1.2	1-6	The text should be emphasize that this Sampling and Analysis Plan is only valid for treatment of soils. If the treatment of a process waste is required, the 90%/10 times rule does not apply.	Clarification was made by adding "soils" to three locations within the paragraph to emphasize the sampling and analysis plan is only valid for the treatment of soils.
171	Sec 2.7.1	2-5	The collection of a single grab sample should be expanded to require that a sample is representative of the soil under investigation.	Changed text to read "A single representative grab sample will be collected and analyzed for UTS metals constituents using the TCLP for each treatability study." to clarify t the grab sample will be representative of the sampled soil.
172	Sec 2.7.2, 2 <sup>nd</sup> para, 4 <sup>th</sup> sentence	2-6	Please define what is meant by "alternate disposal" for treated soils that do not meet the treatment standard. Specify where this alternate disposal occurs, and what is the waste acceptance criteria that allows this to be done.	Added sentence at the end of the paragraph stating "Alternate disposal may be at another facility or a special case approval by the agencies as outlined in Section 2.2.1 of the WAC."